جامعة شعيب الدكالي
Université Chouaïb Doukkali

Académie Hassan II des Sciences et Techniques

Royaume du Maroc
Ministère de l'Enseignement Supérieur, de la Recherche Scientifique et de l'Innovation

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INTERNATIONAL PALAEOENTOMOLOGICAL SOCIETY

BERGAKADEMIE FREIBERG TECHNISCHE UNIVERSITÄT

THE 10th INTERNATIONAL CONGRESS ON

FOSSIL INSECTS, ARTHROPODS & AMBER

First Circular

Chouaïb Doukkali University
Faculty of Sceinces

22nd-28th April, 2027, El Jadida, Morocco

Dear colleagues,

We are pleased to welcome you to the 10th International Congress on Fossil Insects, Arthropods & Amber "**Fossils X3 2027**"to be held 22 – 28 April 2027 at the Mazagan Resort Beach and Faculty of Sciences, Chouaïb Doukkali University, El Jadida. Our congress invites palaeoentomologists from worldwide to convene for a dynamic international exchange of knowledge and experiences. This congress is co-organized by the Faculty of Sciences, Chouaïb Doukkali University and the International Palaeoentomological Society (IPS). The vibrant city of El Jadida plays host to **Fossils X3 2027**, embracing its historical significance. Organized in partnership with Chouaïb Doukkali University Faculty of Sciences El Jadida, National Center for Scientific and Technical Research, Ministry of Higher Education, Scientific Research and Innovation, Hassan II Academy of Sciences and Technology, OCP Group, **Fossils X3 2027** promises to be a convergence of ideas and cutting-edge research. The congress consists of insightful plenary and keynote talks, posters, extensive field trips and thought-provoking discussions. We are looking forward to our congress. Great to have you here at **Fossils X3 2027** in El Jadida!

Cordially, The **Fossils X3 2027** organizers

CONGRESS ORGANIZERS

Department of Earth Sciences, Faculty of Sciences, Chouaïb Doukkali University, in collaboration with the International Palaeoentomological Society (IPS).

ORGANIZATION

Committees

General Chairs

Abouchouaib Belahmira, El Jadida, Morocco (chair)

Hafid Saber, El Jadida, Morocco (vice-chair)

International Scientific Committee

Abouchouaib BELAHMIRA (Chouaïb Doukkali University, El Jadida, Morocco)

Agnieszka SOSZYŃSKA (Vice-President IPS, University of Łódź, Łódź, Poland)

Alexandr RASNITYN (Paleontological Institute Russian Academy of Sciences Moscow, Russia)

Andrew ROSS (National Museums Scotland, Edinburgh, UK)

Antonio ARILLO (Complutense University of Madrid, Spain)

Chenyang CAI (NIGPAS, Nanjing, China)

Dany AZAR (NIGPAS, Nanjing, China)

Diying HUANG (President IPS, NIGPAS, Nanjing, China)

Dmitry KOPYLOV (National Academy of Sciences, Kazakhstan)

Enrique PEÑALVER (Instituto Geológico y Minero de España, Valencia, Spain)

Jacek SZWEDO (University of Gdańsk, Poland)

Julián F. PETRULEVICIUS (Museo de La Plata-UNLP-CONICET, La Plata, Argentina)

Marina HAKIM (Nanjing Institute of Geology and Paleontology

Nanjing, China)

Michael S. ENGEL (American Museum of Natural History, New York, USA)

Mónica M. SOLÓRZANO KRAEMER (Department of Palaeontology and Historical Geology, Senckenberg Research Institute, Frankfurt am Main, Germany)

Olivier BÉTHOUX (Muséum National d'Histoire Naturelle, Paris, France)

Sibelle MAKSOUD (Lebanese University, Lebanon)

Vincent PERRICHOT (Université de Rennes, Rennes, France)

Xavier DELCLÒS (Universitat de Barcelona, Barcelona, Spain)

Organizing Committee

The Organizing Committee is composed by members of the Chouaïb Doukkali University Department of Earth Sciences, Department of Biology research unit "Ecology and Ecosystems Valorization", Sidi Mohamed Ben Abdellah University and Ibnou Zohr University.

- Abouchouaib BELAHMIRA (Chouaïb Doukkali University, El Jadida)
- Hafid SABER (Chouaïb Doukkali University, El Jadida)
- Joerg SCHNEIDER (TU Bergakademie, Freiberg)
- Mourad BOUZIDI (Chouaïb Doukkali University, El Jadida)
- Abdelmajid NOUBHANI (Chouaïb Doukkali University, El Jadida)
- Mariame KHOLAIQ (Chouaïb Doukkali University, El Jadida)
- Zaakour FATNA (Chouaïb Doukkali University, El Jadida)
- Hind EL HACHIMI (Chouaïb Doukkali University, El Jadida)
- Abdelmejid RAHIMI (Chouaïb Doukkali University, El Jadida)
- Abdelkbir HMINNA (Sidi Mohamed Ben Abdellah University, Fez)
- Othmane BOUALLA (Ibnou Zohr University, Agadir)
- Mohamed EL OUALI (UM6P, Benguerir)

Congress e-mail address: fossilsx3conf2027@gmail.com

Postal address: Fossils X3 2027, Chouaïb Doukkali University, Faculty of Sciences, Jabran Khalil Jabran Avenue, B.P. 299-24000, El Jadida – Morocco

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VENUE FOR CONGRESS

The indoor sessions with keynote talks will take place in the **Mazagan Resort Beach** (15 minutes by bus from El Jadida city center) **and Faculty of Sciences El Jadida, Chouaïb Doukkali University**. They are scheduled from April 22nd to April 28th 2027. Plenary and parallel sessions will take place, with business meeting in smaller rooms available to the members of the Managing Committee of the IPS.

LOCATION

The Portuguese City of El Jadida (Mazagan) is located about 90 km southwest of Casablanca and 200 km northwest of Marrakesh. It dominates a natural bay of great beauty. The city is one of the first settlements created in Africa by Portuguese explorers on the route to India, bears outstanding witness to the exchange of influences between European and Moroccan cultures from the 16th to the 18th centuries, which are evident in the architecture, technology and town planning. Mazagan was built as a fortified colony on the Atlantic coast at the beginning of the 16th century. The brothers Francisco and Diogo de Arruda built the first citadel in 1514. In1541-1548, in accordance with the

plans of the Italian architect Benedetto da Ravenna, Joao Ribeiro and Juan Castillo enlarged the citadel transforming it into a star-shaped fortification.

The Old Portuguese city of Mazagão is often referred to as Mellah, because the Jews were the most numerous inhabitants there. Although this historical landmark represents, at the present time, only a small district of El Jadida, it constitutes the main tourist attraction which testifies to the cultural and religious mix of this city. Indeed, one of the characteristics of Mazagão was the cohabitation in perfect harmony of the three monotheistic religions (Islam, Christianity and Judaism). It should be noted that, since 2004, this city is included in the UNESCO "World Heritage list".

90 minutes to Casablanca
3 hours to Marrakesh
6 hours to Agadir

1.Aerial view of the El Jadida city. **2.** Deauville Beach **3.**Portuguese Cistern. **4.** The historic Portuguese ramparts **5.**The Old Portuguese city. **6.** The Old Portuguese city Bazzar **7.**The Moroccan beef Tajine with dried prunes & almonds **8.**The Moroccan traditional chicken & vegetables Tajine.

LANGUAGE

English will be the official language of the congress and the field trips.

SCIENTIFIC SESSIONS

General scientific themes will be mostly organized as plenary sessions, but parallel sessions will also be scheduled, as well as poster sessions. There will be meetings of the International Palaeoentomological Society (IPS) and the Editorial Board of *Palaeoentomology*. The proposed scientific sessions will cover a wide range of fossil insects, amber and amber bio-inclusions, and fossil arthropods topics.

22nd – 23rd: Pre-conference field trip
23rd: Registration and Welcome Reception
24th: Opening, Day 1 of lectures
25th: Day 2 of lectures
26th: Mid-conference field trip
27th: Day 3 of lectures
28th: Closing of the meeting

IMPORTANT DATES

REGISTRATION

- Start of Early Bird Registration: June 1st, 2026
- End of Early Bird Registration: September 30th, 2026

CALL FOR PAPERS

- Start of Abstract Submission: October 1st, 2026
- Deadline for Abstract Submission: January 1st, 2027
- Notice of Abstract Acceptance: February 1st, 2027
- March 30th ,2027, Deadline for proposals of sessions and workshops
- April 1st ,2027, Distribution of Final Circular with Programme

PROCEEDINGS VOLUME

The proceedings of the conference will be published as a Special Issue of the *Earth and Environmental Science Transactions of the Royal Society of Edinburgh.* Deadline for submission of articles will be **March 2027**. Priority will be given to those papers based on talks presented at the conference (all papers will undergo peer review).

REGISTRATION FEES

Conference registration

Full registration	300 USD	3000 dh
Reduced (students)	200 USD	2000 dh

Registration includes congress documents, morning and afternoon coffee breaks and lunches, ice-breaker party.

Excursions registration

Pre-conference field trip	350 USD	3500 dh
Mid-conference field trip	70 USD	700 dh

Costs include all accommodation and restaurants, field guide and transport from and to meeting point.

EXCURSIONS (optional, limited to 40 people)

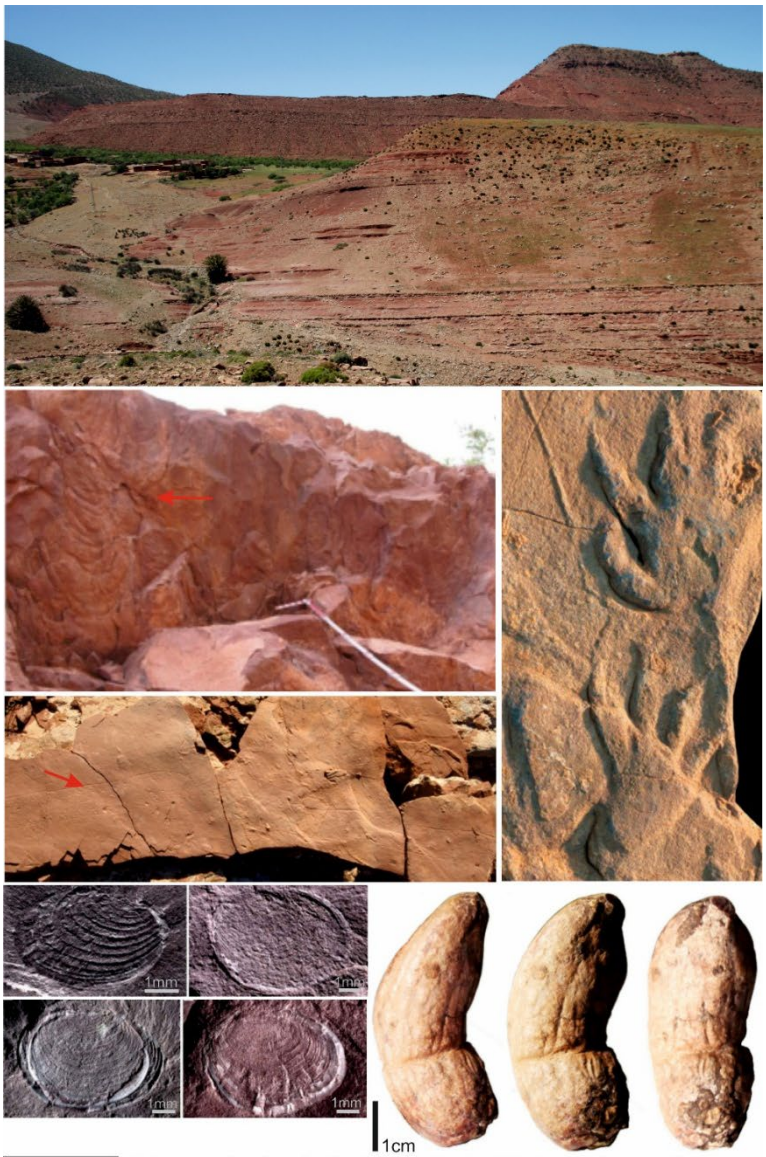
Pre- and mid-conference field trips will be scheduled to take place before and during the conference. The field trips will cover the Palaeozoic and Mesozoic stratigraphy and paleontology of the Moroccan High Atlas Mountains.

Pre-conference field trip: 2 days (22nd – 23rd)

Day1: Visit to the late Palaeozoic and early Mesozoic outcrops of the Argana Basin.

The Argana Basin is located in Southwestern High Atlas of central Morocco, is about 60 km east of Agadir. It refers to an about 20 km wide and 70 km long, NNE–SSW trending area of excellently exposed Permian and Triassic continental deposits. The sedimentary succession of the Argana Basin is divided into the Middle-late Permian red beds of the Ikakern Formation and the Triassic red beds of the Timezgadiouine and Bigoudine formations. The fossiliferous beds are renowned for their ichnodiversity including tetrapod footprints, tetrapod burrows, coprolites, and arthropods trackways. Clam shrimps conchostracans were found associated with ichnofossils.

Stop1: The Jurassic Sauropod tracksite at the Tafaytour region, along the roadside to the Argana.



1.Panoramic view in the Argana Basin. **2.**Tetrapod burrow from the middle Triassic of Argana. **3.** Arthropod trackways. **4.**Tetrapod footprint (Rhynchosauroïdes) from the late Triassic of Argana. **5-6.** Clam shrimps from the late Triassic of the Argana Basin. **5.** *Laxitextella laxitexta*.**6.***?Howellisaura princetonensis*.**7.**Coprofauna from the late Triassic of the Argana Basin.

Day2: Visit to the late Carboniferous outcrops of the El Menizla Formation in the Souss Basin.

The Carboniferous submontaneous Souss Basin, situated about 50 km east of Agadir, is the southwestern-most occurrence of late Palaeozoic deposits in the western High Atlas Mountains, south-central Morocco. The El Menizla Formation is 1200 m thick succession of grayish braid-plain sediments of the composed of fluvial silt-to sandstones, lacustrine mudstones, and decimeter thick coal seams. Finer-grained deposits of the El Menizla Formation yield a quite diverse assemblage of fossil biotic remains including plants, insects, aquatic invertebrates, small actinopterygian fish, temnospondyl amphibian skeletal remains and tetrapod footprints.

1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9

1.The Scenic road to the Souss Basin. **2.** Panoramic view in the Souss Basin. **3.** The uppermost El Menizla Fm. outcrop. **4.** Fossil insect locality at the El Menizla Fm. **5.** Phyloblattid remain (*Phyloblatta occidentalis*). **6.** Opsiomylacrids remain.**7.** *Sphenophyllum verticillatum*. **8.** *Odontopteris lingulata*. **9.** *Culmitschia parvifolia.*

The argan tree is an endemic woodland species found in the Arganeraie Biosphere Reserve in south-west Morocco. Rural women and, to a lesser extent, men living in the reserve practise traditional methods to extract argan oil from the fruit of the tree. The oil has multiple uses for cooking, medicines and cosmetics. These include harvesting the fruit, drying, pulping, grinding, sorting, milling and mixing. All the cultural aspects of the argan tree, including the cultivation of the tree, oil extraction, the preparation of recipes and derived products, and the crafting of traditional tools for the various tasks, contribute to social cohesion, understanding between individuals and mutual respect between communities. Argan oil is given as a wedding gift and is used extensively in the preparation of festive dishes. Traditional know-how specific to the

extraction of the oil and its multiple uses is systematically transmitted by 'argan women', who teach their daughters from a young age to put it into practice.

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3	4

1.The Argan tree *« Argania spinosa »* growing in the southwestern Mrocco's arid and semi-arid zone. **2.** Argan fruit kernels. **3-4.** The traditional extraction of virgin argan oil along with paste from roasted argan kernels using hand millstone.

Mid-conference field trip:

April 26th**:** Visit to the Ganntour phosphate Basin and the archeological site of the Jebel Irhoud

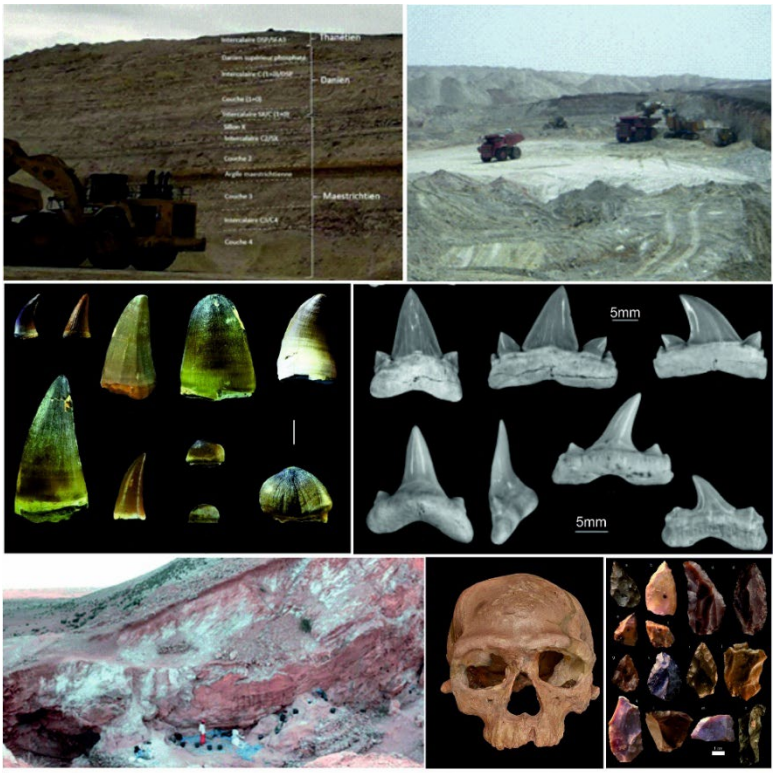
1- The Ganntour phosphate Basin

The Ganntour phosphatic Basin provides insights on the evolution of marine and terrestrial faunas especially during the K/T and P/E major events in poorly known palaeobiogeographical provinces (South Atlantic, Southern Tethys margin, Africa). One of the main characteristics of these phosphates is their extreme richness in the exceptional marine paleobiodiversity (e.g., Mosasaurid, Selachians) preserved locally during 24 Ma, from the Late Cretaceous to the Early/Middle Eocene.

The exploitation of the phosphatic deposits, including the latest Cretaceous to early Ypresians of the Ganntour Basin, represent a key-element in the economy of Morocco, and currently Morocco is the World's first phosphate exporter and one of the first phosphate-growing countries.

2-The archeological site of the Jebel Irhoud

The Jebel Irhoud archeological site is most famous for its hominin fossils. It was discovered in the early 1960s. Since then, a substantial number of fossils have been unearthed from the site, attracting numerous archeological expeditions from around the world. The oldest Homo-sapiens discovered on June 2017 at Jebel Irhoud near Marrakech made unexpected adjustments in science. New hypotheses about human history are actually being considered and it is now believed that human beings have been around for more than 300,000 years.



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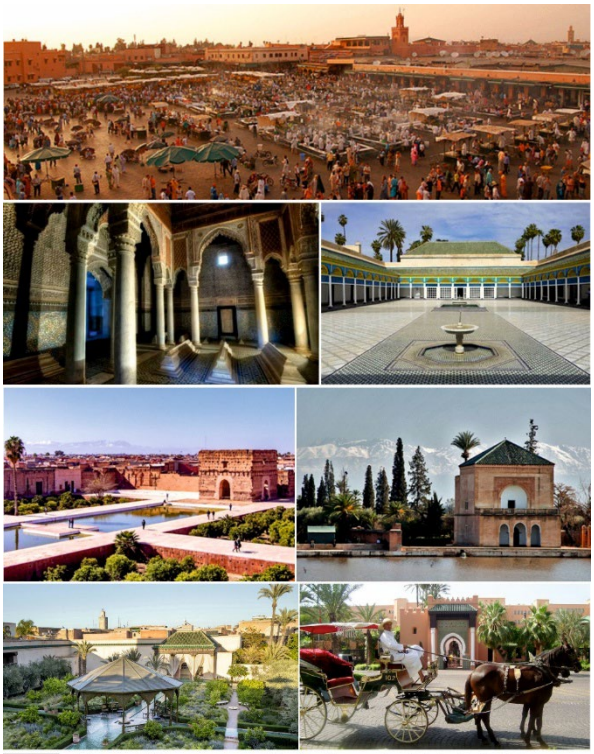
1. The late Cretaceous-early Paleogene typical succession in the Ganntour Basin. **2.** Phosphate exploitation of the Ganntour Basin in the Bengurir region. **3-4.** Teeth from the Maastrichtian of the Ganntour. **3.** Mosasaurid teeth. **4.** Selachian teeth. **5.** Jebel Irhoud Excavation site and hominin fossils. **6.** A Skull of the earliest-known *Homo sapiens* fossils from the Jebel Irhoud. **7.** Lithic tools from the Jbel Irhoud.

TOURISTIC ACTIVITIES

April 29th**:** Visit to the historical landmarks and the Museum of the Water Civilization "Mohammed VI" of Marrakesh

Founded in 1070–72 by the Almoravids, **Marrakesh** remained a political, economic and cultural center for a long period. Its influence was felt throughout the western Muslim world, from North Africa to Andalusia. It has several impressive monuments dating from that period: the Koutoubiya Mosque, the Kasbah, the battlements, monumental doors, gardens, etc. Later architectural jewels include the Badia Palace, the Ben Youssef Madrasa, the Saadian Tombs, several great residences and Place Jamaa El Fna, an open-air theater. Explore the Red Town by horse-drawn carriage (calèches) passing through the famous historical places of Marrakesh. The Museum of the Water Civilization in Morocco "Mohammed VI" in Marrakesh is one of the most fascinating cultural site in relation to the water and one of the unmissable places in Marrakesh.



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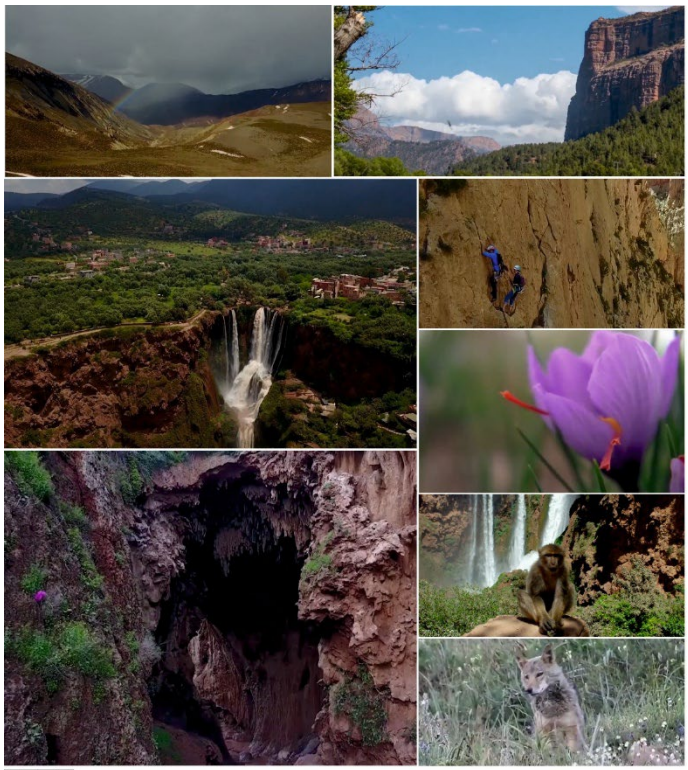
1. Jemaa El-Fna square. **2.** The Saadian tombs. **3.** The Bahia Palace. **4.** El Badia Palace **5.** The Menara Gardens. **6.** The Secret Garden.**7.** Horse-drawn carriage.

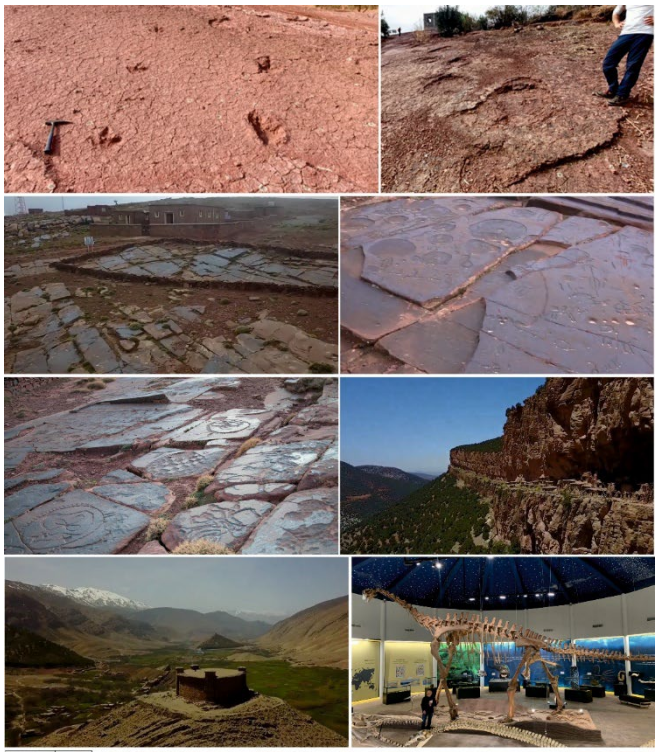
The Museum of the Water Civilization in Morocco "Mohammed VI" in Marrakesh.

April 30th – 31st**:** Visit to the M'Goun UNESCO Global Geopark

The M'Goun UNESCO Global Geopark is located some 100 km from Marrakech in the middle of the central High Atlas Mountains. The M'Goun Massif is a spectacular spine of mountain ridges and sculpted gorges and valleys in the Atlas Mountains. It is the second-highest mountain in Northern Africa, following the Jebel Toubkal. The geological history of the territory of the M'Goun UNESCO Global Geopark fits into the geological evolution of the central High Atlas dating back to the Triassic period, 250 million years ago, while the main stages took place during the Jurassic period, about 180 million years ago. The UNESCO Global Geopark consists of a large number of geosites and biodiversity. It includes geological structures in a NE-SW intra-continental chain resulting from a structural reversal of a Jurassic basin tied to the collision of the African and European plates. It includes famous and spectacular footprints of sauropod and theropod dinosaurs. The territory contains numerous minerals: Copper, zinc, barite, iron, basalt, limestone and dolomitic Triassic red clays.



1-2. Scenic view in the Atlas Mountains of the M'Goun Geopark. **3.** The spectacular cascades of the Ouzoud falls. **4.** Karstic features. **5.** Rock climbing. **6.** The red gold flower *Corcus savitus* (Saffron). **7.** The magot Monkey. **8.** The golden jackal.



1. The Middle Jurassic /the Early Cretaceous Theropod trackways. **2.** The Middle Jurassic/ the Early Cretaceous Sauropod trackways. **3.** Rock carvings geositeat the Ait Bouguemez. **4-5.** Exposed surface with rock carvings at the Ait Bouguemez valley. **6.** Old graneries .**7.** Sidi Moussa mausoleum watchtower. **8.** M'Goun Geopark museum.

Accommodations

There will be several possibilities for accommodation in El Jadida, hotels are close to the avenue. The accommodation system and hotel information will be available. Please note that hotel prices $30-50 per night.

Transportation

The Faculty of Sciences, Department of Geology, which will host the Congress Fossils X3, is located at the Chouaïb University, El Jadida. Public bus and taxi services to and from the centre of the city are provided, with fares of only $1.