

# EXHIBITIONS

Scifest Africa is proud to host interactive exhibitions by institutions all working in the field of science, technology, engineering, mathematics and innovation. Is there a career here for you? All exhibitions are hosted in the 1820 Settlers National Monument unless otherwise specified.

Entrance to all exhibitions is free.

## ALBANY MUSEUM

The Albany Museum, established in 1855, is the second oldest museum in South Africa. It consists of the History Museum, Science Museum, Drostdy Arch, Fort Selwyn, the Observatory Museum and the Provost. It is also home to the Makana Biodiversity Centre and houses many valuable research collections, attractive and informative displays, and has an active education Department.



**ALBANY HISTORY MUSEUM  
(SOMERSET STREET)**

Permanent exhibitions at the Albany History Museum include a display of contact and conflict on the eastern frontier in the 18th and 19th centuries, the popular 1820 Settlers Gallery, and an exhibition on the history of clay.



**ALBANY SCIENCE MUSEUM  
(SOMERSET STREET)**

As part of its 150th birthday celebrations in 2005, the Albany Science Museum opened a Palaeontology Gallery, which provides visitors with a unique glimpse into how the environment and life forms in South Africa have evolved over the last 400 million years. Visit Kirky, the first African dinosaur with an isiXhosa name, and marvel at the size of the stegosaur found in the Bushman's River Valley. The Museum also has comprehensive permanent exhibitions on the Solar System, a bird gallery, a mammal gallery, a "touch and hear" children's gallery, and the old-world Hewitt Gallery.



**DROSTDY ARCH  
(SOMERSET STREET)**

The Drostdy Arch was built in 1842 as the gateway and guardhouse for the Drostdy and military barracks which were located where Rhodes University is situated today. The Drostdy Arch contains a coffee shop and craft shops.



**FORT SELWYN  
(MONUMENT GROUNDS)**

The seven-pointed star fort was built on Gunfire Hill in 1836 but was never involved in any military action. The semaphore mast was intended as a signalling system, connecting the town with Fort Beaufort and Fort Peddie. Visitors by appointment only. Contact the Albany Museum on 046 622 2312.



**OBSERVATORY MUSEUM  
(BATHURST STREET)**

The Observatory Museum contains exhibitions on the role of Grahamstown in the Anglo-Boer War and the story of the discovery of diamonds in South Africa. Of great interest to national and international tourists is the only working Victorian camera obscura in the southern hemisphere. Climb the winding staircase to the turret in the tower, and find the town doctor in the mirrored images of Grahamstown reflected on a circular table.



**THE PROVOST  
(LUCAS AVENUE)**

This unusual building served as an early prison, and was based on the panopticon system, which means that prisoners could be watched continuously from the windows of the central tower. The Provost contains a coffee shop.

## EXHIBITIONS



### AMATHOLE MUSEUM

The International Union of Biological Science (IUBS) uses the Shortridge Mammals Collection, housed at Amathole Museum in King William's Town, to promote the study of biological sciences. The Shortridge Mammals Collection contains several fascinating and important specimens and is extensively used for research both locally and globally. Activities of the IUBS are coordinated under a secretariat at the National Research Foundation (NRF). View some of the specimens and artefacts on loan from the museum and learn more about the natural heritage and people of the Eastern Cape.

[www.amatholemuseum.za.net](http://www.amatholemuseum.za.net)



### COUNCIL FOR THE BUILT ENVIRONMENT

The Council for the Built Environment (CBE), located in Pretoria, is a government body under the Department of Public Works. It promotes awareness on these careers available in the building and construction sector – these being architecture, engineering, landscape architecture, construction project management, property valuation, and quantity surveying. Mathematics and Physical Science are key subjects required to pursue these careers at tertiary level. CBE assists individuals during their tertiary study in these fields with their internship requirement with government departments and private sector host employers. Upon completion of their studies students are mentored through their candidacy phase, and encouraged to register as professionals with the relevant council of their discipline, which entitles them to practice as a built environment professional in South Africa. CBE can be contacted for more information on Tel: 012 346 3985

[www.cbe.org.za](http://www.cbe.org.za)

**BASF**  
We create chemistry

### BASF HOLDINGS SOUTH AFRICA (PTY) LTD

<b>DATE:</b>	Daily
<b>TIME:</b>	09h30-10h30, 11h30-12h30, 13h30-14h30, 15h30-16h30, 17h00-17h30
<b>VENUE:</b>	Monument, Fountain Court
<b>AUDIENCE:</b>	Grade 3-8
<b>CAPACITY:</b>	20
<b>PRICE:</b>	Free, Booking Essential

BASF Kid's Lab is an interactive chemistry programme that focuses on educating today's children about the role of chemistry in building a sustainable future. Our Clever Foodies programme, especially designed for learners between the ages of 8 and 12, gives them an opportunity to participate in explorative and interactive chemical experiments to detect and identify vitamins and secondary metabolites (pigments).

[www.basf.co.za](http://www.basf.co.za), [www.basf.com](http://www.basf.com)



agriculture,  
forestry & fisheries  
Department:  
Agriculture, Forestry and Fisheries  
REPUBLIC OF SOUTH AFRICA

### DEPARTMENT OF AGRICULTURE, FORESTRY AND FISHERIES

Discover vast science, engineering and technology career options in the field of agriculture, forestry and fisheries that you never knew existed where you can make a meaningful contribution to the economy while doing what you love most – applying science and technology to the living world of plants, soil, water, animals etc.

[www.daff.gov.za](http://www.daff.gov.za)



### BAYWORLD

Bayworld is situated on the Port Elizabeth beachfront and incorporates the Museum, Reptile Park, Oceanarium and Port Elizabeth Museum School. The school is unique and is registered with the Eastern Cape Department of Education. The passionate education team will teach the young and old about the wonders of nature. This year they present "The Venom Diaries" an interactive exhibition that lifts the lid on venomous snakes in South Africa. It promises to be an educational treat. Come talk about these fascinating creatures, their distribution across our country, habitats, diet, reproduction and environmental significance. All snake lovers, phobics or fear facers are invited!

[www.bayworld.co.za](http://www.bayworld.co.za)



### ENGINEERING COUNCIL OF SOUTH AFRICA (ECSA)

The Engenius programme was established by the Engineering Council of South Africa to highlight the importance of the engineering field to primary and high school learners especially from grade 10. The education programme does school visits and exhibitions around the country. We interact with learners by allowing them to take part in exciting activities such as the Bloodhound activity where they get to build a mini rocket using everyday things like balloons.

Engenius strives to promote the engineering profession nationally to 20 000 primary and high school learners annually through its driving message 'Engineering Makes It Happen'. So far, Engenius has reached over 12 million learners at roughly 6 000 high schools across South Africa.

[www.ecsa.co.za](http://www.ecsa.co.za)

[www.daff.gov.za](http://www.daff.gov.za)

## DEPARTMENT OF SCIENCE AND TECHNOLOGY (DST)



science  
& technology

Department:  
Science and Technology  
REPUBLIC OF SOUTH AFRICA



### ACADEMY OF SCIENCE OF SOUTH AFRICA (ASSAF)

Quest: Science for South Africa: Igniting conversations around recent developments in the science arena and assisting science learners in contextualizing science and mathematics content.

[www.assaf.org.za](http://www.assaf.org.za)



our future through science

### COUNCIL FOR SCIENTIFIC AND INDUSTRIAL RESEARCH (CSIR)

The Council for Scientific and Industrial Research (CSIR) in South Africa is one of the leading multi-disciplinary scientific and technology research, development, innovation and implementation organisations in Africa. Engage with the groundbreaking work done by researchers in the various units of the CSIR, as well as the many exciting career opportunities available at the CSIR.

[www.csir.co.za](http://www.csir.co.za)



### ITHEMBA LABS

iThemba LABS is a national research facility administered by the National Research Foundation, which is committed to unleashing SA potential through knowledge creation, innovation and human building capacity.

[www.tlabs.ac.za](http://www.tlabs.ac.za)



### NATIONAL ZOOLOGICAL GARDENS OF SA (NZG)

The National Zoological Gardens (NZG) of South Africa is the largest ZOO in the country and includes the largest inland marine aquarium in the country, a reptile park, and the third largest collection of exotic trees. Visit the NZG to learn more about Animal Sciences and South African Biodiversity. Learn more about the research and scientific services conducted at NZG.

[www.nzg.ac.za](http://www.nzg.ac.za)



### A JOURNEY TO SPACE AND COSMIC COLLISION

An interactive astronomy presentation in a mobile planetarium. The presentation covers basic astronomy concepts while entertaining. Participants will discover space and learn the science of the birth and death of stars. Cosmic collision – a radical change from our peaceful night sky. Cosmic collisions presents the spectacular results of gravity pulling together planets, stars and galaxies.

[www.saasta.ac.za](http://www.saasta.ac.za)



### SCIQUEST

The SciQuest is an interactive mobile science educational exhibition. It consists of various units that teach different concepts in all the fields of science, engineering and technology in a fun and entertaining way. The exhibition appeals to both young and old.

DEPARTMENT OF SCIENCE AND TECHNOLOGY (DST)



science & technology

Department: Science and Technology  
REPUBLIC OF SOUTH AFRICA



**SOUTH AFRICAN ASTRONOMICAL OBSERVATORY (SAAO)**

South African Astronomical Observatory's prime function is to conduct fundamental research in astronomy and astrophysics. It does so by providing a world-class facility to scientists. The SAAO promotes astronomy and astrophysics in Southern Africa, by sharing research findings and discoveries.

[www.saa0.ac.za](http://www.saa0.ac.za)



**SOUTH AFRICAN ENVIRONMENTAL OBSERVATION NETWORK (SAEON)**

The South African Environmental Observation Network (SAEON) is a National Research Facility of the National Research Foundation. As global climate change tightens its grip on our planet, people's lives and livelihoods are placed at risk by the natural disasters caused by these changes in our climate. Society needs reliable information to understand why and how our world is changing so that we can plan for the future. This is why SAEON exists. Understand how SAEON initiates and maintains a network of observations to execute the long-term monitoring of ecosystems

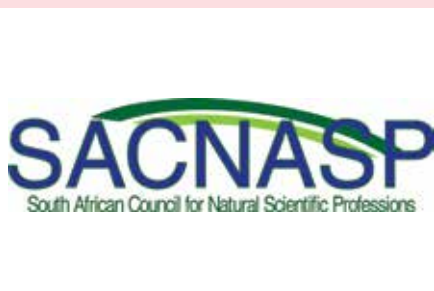
[www.saeon.ac.za](http://www.saeon.ac.za)



**DST-NRF CENTRE OF EXCELLENCE IN PALAEOSCIENCES**

Imagine being able to travel through time. See the big bang formation of the solar system, and formation of the Earth. Watch how life forms, simple animals appear and then as the continents shift, and the climate changes from global warming to ice age, again and again, we see four legged fish, the evolution of plants, insects, dinosaurs, mammals and eventually –right at the end- humans appear!!! This exhibition allows visitors to travel through time but also explains how science and technology have revealed these fascinating stories which offer insights into our common future.

<http://ancient-earth.co.za/>



**SOUTH AFRICAN COUNCIL FOR NATURAL SCIENTIFIC PROFESSIONS**

Our exhibition will talk to the diversity that exists within the science community and just how science affects all of our lives. We will showcase how many careers can be engaged in that are exciting and different. We will hand out leaflets on science and have discussions about science in our lives. SACNASP has 24 fields of practice associated with it and our aim is to show scientists the need to register with a professional body to maintain their standards of the industry. We will show scientists how they can continue their studies throughout their career and encourage professional natural scientists to become mentors to those just starting their careers. We will also help to guide the parents of young learners through their choices they need to make during their study years.

[www.sacnasp.org.za](http://www.sacnasp.org.za)



**SOUTH AFRICA RADIO ASTRONOMY OBSERVATORY (SARAO)**

The South Africa Radio Astronomy Observatory (SARAO) was established in 2017 and incorporates the Hartebeesthoek Radio Astronomy Observatory (HartRAO) in the North West province, and all instruments and projects currently operated by Square Kilometre Array South Africa (SKA SA), including MeerKAT and the Karoo Array Telescope (KAT-7) in the Karoo, the African Very Long Baseline Interferometry Network (AVN) programme in nine African countries, as well as the associated human capital development and commercialisation endeavours. Stay a while and learn more about radio astronomy and space geodesy through interactive activities, or embark on a virtual tour of the SKA site in the Northern Cape, our Solar System and the Milky Way.

[www.hartrao.ac.za](http://www.hartrao.ac.za); [www.ska.ac.za](http://www.ska.ac.za)



**ESKOM'S ENERGY EDUCATION PROGRAMME**

Eskom's Energy Education Programme aims to educate school children about the value of electricity and the important role it plays in bringing so much comfort into the home. It aims to bring awareness to the fact that 'flicking a switch' is so quick and easy that one almost never considers the huge positive impact electricity has on our daily lives.

[www.eskom.co.za/sites/idm/SchoolYard/](http://www.eskom.co.za/sites/idm/SchoolYard/)





**ESKOM EXPO FOR YOUNG SCIENTISTS**

The Eskom Expo for Young Scientists is South Africa's prestigious and only existing international science fair that affords learners the opportunity to enter a project to exhibit their own scientific investigation. The project aims to inspire and develop young scientists who are able to identify a problem, analyse information, find solutions and communicate findings effectively. Learners must first enter a project into one of 35 regional finals held between July and September every year, then a select few are chosen to represent their region at the Eskom Expo International Science Fair in Pretoria, Gauteng in the spring school holidays, and from there to represent South Africa at international science fairs around the world.

[www.exposcience.co.za](http://www.exposcience.co.za)



**FRENCH SOUTH AFRICAN INSTITUTE OF TECHNOLOGY (F'SATI)**

We will illustrate models of our heritage 1U nanosatellite, ZACUBE-1 (TshepisoSAT), and the succeeding generation 3U nanosatellite, ZACUBE-2. South Africa's most advanced CubeSat to date. In addition, there will be a few project demonstrations by our innovation hub, Africa Space Innovation and the newly formed engineering club, the Space Cadets.

[www.cput.ac.za/fsati](http://www.cput.ac.za/fsati)



**FOSST DISCOVERY CENTRE, UNIVERSITY OF FORT HARE**

FOSST Discovery Centre will be bringing exciting and cutting edge interactive exhibits that are curriculum based. Our interactive exhibits will assist and enhance the understanding, skills and knowledge of the learners. These will also give them challenges to manipulate, visualize, and apply the cognitive skills to integrate the knowledge that they already possess.

[www.ufh.ac.za/centres/fosst](http://www.ufh.ac.za/centres/fosst)



**GOVAN MBEKI MATHEMATICS DEVELOPMENT CENTRE, NELSON MANDELA UNIVERSITY**

The Govan Mbeki Mathematics Development Centre will exhibit its TouchTutor range of applications which include a full range of curriculum aligned learning resources for maths and science including videos, tests, experiments and applets. Hands-on features include science and maths quizzes on mobiles, GeoGebra applets for learners to explore, puzzles to solve and structures to build. The exhibit includes STEAM materials and activities, an integrated approach to integrating creativity across disciplines.

<http://mbeki-maths-dev.nmmu.ac.za/Home>

**IZIKO MUSEUMS OF SOUTH AFRICA**



**IZIKO MOBILE MUSEUM**

Iziko Mobile Museum is an ongoing outreach project designed to take educational museum resources to schools and communities that are unable to visit the museums. It is a customised vehicle with interactive modules that complement the natural sciences and social sciences learning areas of the National Curriculum Statement for grade 4-9. Visit the Mobile Museum and learn about our country's social and natural heritage of which we are proud of.



**IZIKO PLANETARIUM**

The Iziko Planetarium and Digital Dome, situated alongside the Iziko Museum in Cape Town, is used to recreate and take learners and the general public on a journey through the wonders of the Universe. Staff of the Iziko Planetarium will teach visitors, both young and old, about indigenous astronomy and starlore and modern astronomy.

[www.iziko.org.za](http://www.iziko.org.za)

## EXHIBITIONS



### MINTEK

Mintek is South Africa's national mineral research organisation and is one of the world's leading technology organisations specialising in mineral processing, extractive metallurgy and related areas. Mintek works closely with industry and other R&D institutions and provides service testwork, process development and optimisation, consulting and innovative products to clients worldwide. The technical programmes at Mintek are aimed at generating high economic returns for the national and regional economies while social programmes focus on skills development and educational initiatives. An important target is the nurturing of self-sustaining local economies in areas of South Africa where smaller minerals extraction and beneficiation enterprises have the capability to generate broad-based employment and wealth.

[www.mintek.co.za](http://www.mintek.co.za)

[www.mintek.co.za](http://www.mintek.co.za)



### NATIONAL METROLOGY INSTITUTE OF SOUTH AFRICA

NMISA uses additive manufacturing systems to print/manufacture prototypes and final products for measuring systems. The exhibition will highlight critical elements of the standards and measurements in 3D printing in order to achieve safe, reliable products of high quality.

[www.nmisa.org.za](http://www.nmisa.org.za)



### NASA JET PROPULSION LABORATORY (JPL)

Africa as Art

In 1960, the United States put its first Earth-observing environmental satellite into orbit around the planet. Over the decades, these satellites have not only provided invaluable information, but the vantage point of space has provided new perspectives on Earth. This exhibition, inspired by the NASA publication, Earth as Art, celebrates Africa's aesthetic beauty through the shapes, patterns, colours and textures of the land, oceans, ice, and atmosphere of our continent.

This exhibition is supported by NASA

[www.nasa.gov/connect/ebooks/earth\\_art\\_detail.html](http://www.nasa.gov/connect/ebooks/earth_art_detail.html)



### NELSON MANDELA UNIVERSITY (NMU)

Nelson Mandela University (NMU) has the vision to see beyond today, to lead you to a brighter tomorrow. NMU is a new generation university, offering students the best of both theory and practice from entry certificate level right through to doctoral research. Founded on more than a century of quality higher education, Nelson Mandela University nurtures innovation, foster creativity embraces technology and develops people to meet the challenges of tomorrow. The university has already established itself as a leader in fields such as automotive engineering, ecology, marine studies, community health, the built environment, art & design, accounting & auditing, education and IT, offering students a wide choice of stimulating and market oriented courses, and opening up a variety of career opportunities.

[www.mandela.ac.za](http://www.mandela.ac.za)



an agency of the  
Department of Arts and Culture

### NATIONAL ENGLISH LITERARY MUSEUM

<b>DATE:</b>	7-9,12,13 March
<b>TIME:</b>	10h00-11h00, 12h00-13h00, 14h00-15H00
<b>VENUE:</b>	National English Literary Museum, 25 Worcester Street
<b>AUDIENCE:</b>	All
<b>CAPACITY:</b>	30
<b>PRICE:</b>	Free, BOOKING AT THE REGISTRATION DESK ESSENTIAL

The National English Literary Museum houses the world's most comprehensive collection of resources relating to South African literature in English. The new National English Literary Museum building is the first museum in South Africa to be assessed by the Green Building Council of South Africa. The design achieved a 5-Star rating and the 'as built' assessment is currently underway.

[www.nelm.org.za](http://www.nelm.org.za)

## DID YOU KNOW

**WHAT IS 5 TIMES HOTTER THAN THE SUN?**

**THE BOLT OF LIGHTNING IS HEAPS HOTTER THAN THE SUN. THE SURFACE OF THE SUN HAS A TEMPERATURE OF 5726.66 °C. WHEREAS A LIGHTNING BOLT CAN REACH A TEMPERATURE OF 29726.66 °C WHICH IS 5 TIMES HOTTER THAN THE SUN!**





### SCIENCE STARS

Science Stars magazine is a bi-monthly magazine that promotes science. The magazine offers career options, a list of companies that provide bursaries and scholarships, tertiary institution contact details, science tips and fun-with-science pages.

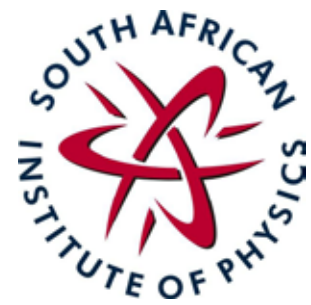
[www.sciencestars.co.za](http://www.sciencestars.co.za)



### SOL PLAATJE UNIVERSITY

The Sol Plaatje University in Kimberley draws on the distinctive strengths and heritage of the Northern Cape, stimulating provincial and national development and has the potential to inject new life and purpose into Kimberley and the Northern Cape – a place bursting with energy, attracting people from all over Southern Africa and from other continents.

[www.spu.ac.za](http://www.spu.ac.za)



### SOUTH AFRICAN INSTITUTE OF PHYSICS (SAIP)

The SA Institute of Physics (SAIP) is a non-profit, voluntary and professional physics society that was established in 1955. SAIP is registered with SAQA as a professional body and our mission is to be The Voice of Physics in South Africa. It has a membership made up of professionals, academics, students and institutions.

[www.saip.org.za](http://www.saip.org.za)



### SOUTH AFRICAN NATIONAL BIODIVERSITY INSTITUTE

There is an amazing amount of Biodiversity in each garden. You can touch and feel magnificent plants. Catch colourful insects, and feel the scaly reptiles. You can cuddle mammals, and as people contribute to their sustainability. How do you do it? Dealing with threats to our Biodiversity.

[www.sanbi.org](http://www.sanbi.org)



### SOUTH AFRICAN NATIONAL ROADS AGENCY LIMITED (SANRAL)

SANRAL prides itself in delivering a high standard of road infrastructure nationally. We support students at tertiary institutions across the country and award scholarships and bursaries to learners, to enable them to access further educational opportunities. We also promote interest in stem subjects – science, technology, engineering and maths. We work closely with universities involved in advanced research on aspects of transportation, engineering, construction and road safety.

[www.sanral.co.za](http://www.sanral.co.za)



### SOUTH AFRICAN SOCIETY FOR BIOINFORMATICS STUDENT COUNCIL (SASBI SC)

Bioinformatics is the study of large amounts of biological information. It is done mostly with the help of computers. It is a relatively new branch of science that is accelerating as the data revolution comes to the natural science. Using tools from mathematics, statistics and computer sciences, bioinformatics sheds light on previously unexplorable biological problems. This allows us to predict the structures of proteins, perform genome assemblies and model the intricacies of chemical reactions within biological systems. This exhibition by the SASBi student council provides some insight into how bioinformaticians explore and solve these new and exciting problems.

<http://www.sasbi.weebly.com/students.html>

## EXHIBITIONS



### STENDEN SOUTH AFRICA

We offer 2 Degree Programs: B.Com Hospitality Management and BBA Disaster Management. Located in Port Alfred. Internationally recognizes and International opportunities full accredited with the CHE and DHET. 97% of graduates employed.

[www.stenden.ac.za](http://www.stenden.ac.za)

### DEPARTMENT OF WATER AND SANITATION

The Department of Water and Sanitation is the custodian of South Africa's water resources, and strives to ensure that all South Africans have access to clean water and safe sanitation. It is responsible for the formulation and implementation of policy governing our water resources, promotes effective and efficient water resources management to ensure sustainable economic and social development, and is responsible for water services provided by Local Government.

[www.dwa.gov.za](http://www.dwa.gov.za)

### UNIVERSITY OF SOUTH AFRICA (UNISA)

The UNISA College of Science, Engineering and Technology is the responsive, enabling and accessible provider of high quality, relevant, innovative Open Distance Learning Science, Engineering and Technology programmes, research and community engagement in Africa.

<http://www.unisa.ac.za/sites/corporate/default/Colleges/Science,-Engineering-&-Technology>

## RHODES UNIVERSITY

Rhodes University is nestled in the heart of Grahamstown and is home to more than 7,500 students from around the world. The university owes its unique character among South African universities to a combination of architectural, cultural, geographical and historical factors. Its history is a chronical of those whose intellect, vision and courage created and sustained a university that grows form strength to strength each year. Successive generations of Rhodians have had an influence on Southern African and world affairs out of all proportion to their small number.

The Rhodes University Scifest Africa 2018 Programme is presented by the Faculty of Science. Find out more about the various departments, the world-class research done in each, and why Rhodes University is "where leaders learn".

Rhodes University  
Somerset Street  
Grahamstown  
[www.ru.ac.za](http://www.ru.ac.za)

### EXHIBITIONS

**Rhodes University Biotechnology Innovation Centre**  
*Advancing Biotechnology through 3D printing*

**Faculty of Pharmacy**  
*Dermatologic health: Dangerous chemicals in skin lightening products*

Start	End	Organisation Title	Audience	Capacity	Price	Venue
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### WEDNESDAY, 7 MARCH

09h00	09h45	<b>Rhodes University Department of Chemistry</b> <i>Glassblowing Workshop Demonstration</i>	Gr 10	10	R15	RU Chemistry and Pharmaceutical Sciences Building, Glassblowing workshop
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