

# AgulhasNPark eBulletin

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Et lux in tenebris lucet - and the light shineth in the darkness

www.sanparks.org

## Cape Agulhas Lighthouse recognised as an International Historic Civil Engineering Landmark

The American Society of Civil Engineers (ASCE) awards International Historic Civil Engineering Landmark status to selected works which comply with very strict criteria. The local counterpart of ASCE, the South African Institution of Civil Engineering (SAICE), was invited to nominate another work for consideration by the ASCE Heritage Committee. The SAICE History and Heritage Panel considered several projects and it was felt that the Lighthouse at Cape Agulhas was the most deserving of the accolade in accordance with the ASCE criteria. SAICE is delighted that, after a comprehensive investigation, ASCE decided to accept the proposal.



#### The Lighthouse as an engineer-designed structure

The most important criteria for the Lighthouse was that it was the first engineer-designed lighthouse in South Africa by the first known trained engineer in South Africa at the time, Lt. Col. C. C. Michell. He was also the Surveyor-General of the Cape Colony. The Lighthouse was designed and built in the style of the Pharos of Alexandria, Egypt, one of the seven wonders of the Ancient World. He was influenced by the Egyptian Revival architecture, which today is thought to be unique among world lighthouses.



### Unveiling the International Historic Civil Engineering Landmark plaque

Cape Agulhas Lighthouse received its International Historic Civil Engineering Landmark plaque on May 12, 2016 during a special function in Cape Town. It was followed by a function at the Lighthouse on May 14 when the plaque was unveiled by the President of the American Society of Civil Engineers, **Mr. Mark Woodson**. Guests attending included members of the South African Institution of Civil Engineering, Lighthouse Services and community members who saved the lighthouse from being demolished in the 1970s.





























Cape Cluster Parks boast with two International Civil Engineering Landmarks The second recognised historic civil engineering landmark in the Cape Cluster Parks is the Woodhead Dam on Table Mountain, which was built in 1897 and declared a historic landmark in 2008. This landmark falls within SANPark's Table Mountain National Park, but belongs to the City of Cape Town. The dam was the first stone masonry dam built to store water for the City of Cape Town.



#### Fight illegal wildlife trade - World Environment Day, June 5

World Environment Day was established by the United Nations General Assembly in 1972 with the aim of encouraging people to become active supporters of sustainable and equitable living, to promote awareness and an understanding that communities play a central role in changing attitudes towards environmental issues. The theme for 2016 is *Go Wild for Life* and *Zero tolerance for the illegal wildlife trade*. The booming illegal trade in wildlife products is eroding Earth's precious biodiversity, robbing us of our natural heritage and driving whole species to the brink of extinction. The killing and smuggling is also undermining economies and ecosystems, fuelling organised crime, and feeding corruption and insecurity across the globe. Wildlife crime endangers iconic elephants, rhinos, tigers, gorillas and sea turtles. Lesser-known victims include helmeted hornbills and pangolins, as well as wild orchids and timbers like Rosewood – flowers and timber are also considered wildlife! This year's theme – **Go Wild for Life** – encourages you to celebrate all those species under threat and take action of your own to help safeguard them for future generations. This can be about animals or plants that are threatened within your local area, as well as at the national or global level - many local extinctions will eventually add up to a global extinction! Whoever you are, and wherever you live, show zero-tolerance for the illegal trade in wildlife in word and deed, and make a difference. Read more at <a href="http://www.wed2016.com/front">http://www.wed2016.com/front</a>.

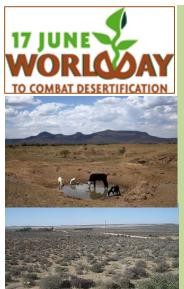


# **Biodiversity Density Survey – Carly Cowell, Regional Ecologist, Cape Research Centre**

The Cape Research Centre visited the Agulhas National Park recently to conduct a biodiversity density survey. Designated areas or plots were located using a minute-by-minute grid mapping (individual cell = Monad) system, with one plot per Monad. In the Agulhas area a Monad equates to about 1.5km by 1.85km. All plots are located at least 100 to 200m from the nearest road or other infrastructure (which can also be a ploughed field) and each plot is 10 by 10 metres. Each site is identified by the GPS co-ordinate of the North Western corner of the plot and given a unique alpha-numeric code to identify it from other plots in and outside the park. This information is inserted on the data sheet. All species within the plot are recorded as well as the percentage cover of vegetation, leaf litter and soil. Items like fire regime and current and past land use are recorded. A total of 514 plant species were found in 18 plots inside the park and 143 plant species (40% alien) outside the park in the same number of plots. This shows that before land was transformed by agriculture and other activities, the species diversity was very high. The park is now the refuge for many of the fynbos species and for some the only place left where they can be found.







#### World Day to Combat Desertification and Drought, June 17

South Africa is experiencing its worst drought in years. The effect on the most essential resource, water, is seen every day in the media and experienced by both man, animal and plant life. March and April 2016 measured higher temperatures compared with the same World Day to Combat Desertification and Drought, June 17, was months in 2015. proclaimed by the General Assembly in 1994. On that date, the same year, the United Nations Convention to Combat Desertification was adopted. Countries were invited to devote this World Day to promoting awareness of the need for international cooperation to combat desertification and the effects of drought, and on the implementation of the Convention to Combat Desertification. It aims to promote community and ecosystem resilience while improving the human condition particularly in dry lands. The decade 2010-2020 has been declared the United Nations Decade for Deserts and the Fight against Desertification (UNDDD). In 1994, the United Nations General Assembly declared June 17 the World Day to Combat Desertification and Drought to promote public awareness of the issue, and the implementation of the United Nations Convention to Combat Desertification (UNCCD). The declaration was aimed at combating desertification in those countries experiencing serious drought and/or desertification, particularly in Africa. Read more at www.undp.org/drylands/, www.unccd.int and www.gov.za.

### World Oceans Day, June 8

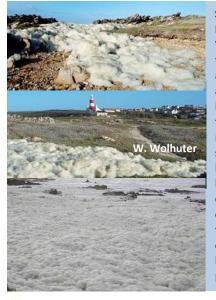
The ocean is the heart of our planet. Like a human heart pumping blood to every part of the body, the ocean connects people across the Earth, no matter where they live. The ocean regulates the climate, feeds millions of people every year, produces most of the oxygen breathed, is the home to an incredible array of wildlife, provides humans with important medicines,





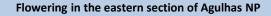
and so much more! To ensure the health and safety of communities and future generations, it is imperative that humans take the responsibility to care for the ocean as it cares for them. Everyone's health depends on a clean, productive ocean. During the celebration this year, the theme is *Healthy Oceans Healthy Planet*, with the aim of encouraging people to once again think about what actions individuals can take to safeguard vulnerable ocean communities. Please focus on whatever issues you think are most important for a healthy ocean in the future. The ocean and its wildlife is choking on plastic and it needs to be cleaned up. Not only that, but this pollution needs to be cleaned up at the source. A new study says that by 2050 there will be more plastic in our oceans than fish. (SOURCE: www.worldoceansday.org)





# Sea foam on the Cape Agulhas Coast - Prof. Gavin W. Maneveldt (PhD), Department of Biodiversity & Conservation Biology, University of the Western Cape

With the first storms in late April the Cape Agulhas shore was covered with a thick white foam above the high water mark. Such 'sea foam' are usually preceded by a storm that accumulates the foam on the shore. Often the foam is also blown more landward where it also then accumulates. The sea foam is actually the dissolved organic matter in the sea that is churned up due to vigorous sea conditions. Rocky shores in particular are prone to 'sea foam' as the rocky substrate themselves act to churn up the dissolved organic matter. In many instances, the content of the sea foam are comprised of decaying algal blooms (often surf diatoms and other phytoplankton) that might have accumulated offshore and are now brought onshore by the prevailing winds and waves. Sea foam is also very common near kelp beds, due to the high amount of particulate organic matter that result from the decaying ends of kelp. The colour of the foam can be attributed to the type of dissolved organic matter present and the state of decay of that organic matter. In the case of green foam, it is probably due to the concentration of chlorophyll pigments still present in the concentrated matter. In many instances though, when an offshore decayed algal bloom has been the result of the sea foam, the pigmentation from the accumulated organic matter has probably all been lost and thus essentially results in a white-coloured foam.



#### Flora se Geheime Taal – written by Madine Swart and illustrated by Janet Snyman

This is a book about the symbolic meaning of South African plants with the focus on the role of indigenous traditions in the establishment of common names. It includes chapters about Flora Capensis' journeys abroad, the recording of common names, challenges that faced the earliest plant hunters in South Africa and stories about women plant collectors like Hester Joubert, Elsie Esterhuysen and Maria Wilman. The traditional uses of plants for funerals, protection, as well as dating are described based on their symbolic meanings and the presence of plants in South African art, literature and music. Examples of work by Overberg writers like Con de Villiers, Audrey Blignaut and Suzanne van Rensburg are used to illustrate the use of plant symbolism in Afrikaans literature. A selection of plants from the Agulhas Plain explains the different characteristics and temperaments assigned to plants. The symbolic meanings for plants listed in this book are derived for their common names, botanical names, mythology, description, ecology, as well as traditional uses. Symbolism creates a new language that tells us more about a relationship between a plant in an "outer landscape" and a reaction or emotion in an "inner landscape". This language opens a sense of wonder and appreciation for the intelligence of plants, as well as the lessons or gifts they offer us. (Madine Swart is a born and bred Strandvelder and the granddaughter of Oom Bertie Swart of Uitkyk and Wiesdrift on the Agulhas Plain.)





#### **Elim Flower Traditions - Madine Swart**

Church traditions are an integral part of life in Elim and most of these traditions are celebrated with fynbos from the veld surrounding the town. These rich flower traditions were shared by three members of the community who have been involved with the Elim Flower Festival since it started in 1985: Carolina Apollis, Maggie Schippers and Christina Afrika. They also shared their knowledge of the local plants with the authors of Southern Overberg South African Wild Flower Guide 8 (1997), and made a valuable contribution by supplying common names for this publication. During Easter time (Paasfeestyd) family members who have moved away return to their home town Elim to celebrate and pick flowers for decorating the church as well as the graveyard or Godsakker. Easter heath or Rysies (Erica tenella) are picked for decorating the beautiful Moravian Mission Church, dating back to 1835, as well as the graveyard. The Childrens Festival (Kinderfees) in August is celebrated with the help of Struthiola, Erica, Protea and Leucospermum species. The community of Elim remembers and honours their deceased during Sunday of the Death ("Dodesondag") or Eternity Sunday ("Ewigssondag") in November when the graves are decorated with the flowering heads of pincushions or Luise (Leucospermum cordifolium). These flower traditions tell a story of religious devotion and add to this community's rich history with Thatching reed or Pannetjiesriet (Elegia tectorum) and Everlastings or Matrassewejaartjies (Syncarpha vestita) that are also part of the villages' plant heritage. Thatching reed is used for the traditional Elim craft of thatching and the flowering heads of the Matrassewejaartjies were used to stuff mattresses and making wreaths. This was the first fynbos plant to be picked and exported by the Elim community in the late 1800s.











#### Flowering now .....









