



SAKHISIZWE

(Building the Nation)

EDITION 2

The children of any nation are its future. A country, a movement, a person that does not value its youth and children does not deserve its future.

- Oliver Tambo -



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The IPP Office Welcomes New Minister of Energy

The winds of change have blown our way and have brought us the longest serving, and most experienced Minister in Parliament, as the new Minister of Energy - Honourable Minister Jeff Radebe.

Welcome Sir! We welcome you to the energy sector and, on behalf of the management and staff of the IPP Office, it is a wonderful privilege to have you and all your years of experience. Your reputation precedes you and we are proud to have you as the captain of our ship. We are certain your leadership, decisiveness and direction will guide us to achieve great things! So much more still has to be done despite our hard work over the last few years.

You will bring a new spark to the energy department, its SOCs and our IPP family initiatives. We have so many good stories to tell. This little publication is only one attempt, to give the world a glimpse into the many wonderful examples of successes we have achieved, in partnership with the private sector in South Africa. We know this is small relative to what we need to achieve, but at least this is a start. And in any event nothing can ever be completed and final in a country with so much poverty and inequality.

We hope to soon introduce you to everything we have achieved and still hope to achieve. We welcome your leadership and guidance and we are sure you will experience us a very special, committed and capable team of professionals in an office that lives to make a difference. A team committed to take what we are doing to another, much higher level.

South Africa needs each one of us to make a difference. We need people with selfless interest in the well-being of the less fortunate people.

As our great leader Nelson Mandela once said - every time you get to the top of the hill you see an even higher hill to climb. And that is exactly our daily experience. But is that not what makes South Africa such a great country to live in? What some people see as obstacles and challenges, we see as great opportunities to show the world how many great people we have and what a wonderful opportunity we have been given to serve our people in such a humble way!

We wish you a long and fruitful stay with us as Minister of Energy! We believe you will recognize what a real difference the IPP programmes are making, and will continue to contribute to the changes in people's day to day lives.

Welcome on board Minister Jeff Radebe!



Foreword

Premier of the Northern Cape the Honourable Ms. Sylvia Lucas



The Renewable Energy Independent Power Producer Procurement Programme (REIPPPP) is a priority programme for the Province and proves to be a game changer, and the hope of a better tomorrow for many of our people. This is a sector that can assist Government to radically transform the economy. As a Province, we wish to express our gratitude for the social upliftment projects that are being delivered by the Independent Power Producers (IPPs) in the Northern Cape. These projects not only benefit the communities in the area of the REIPPPP, but reaches beyond their footprint. They achieved what I always longed for, and that is some hope of an economic boost and the social upliftment of our poorest communities, where it is needed most. When I realized the full extent of the IPP commitment and the manner in which they have delivered, we in the Northern Cape are all touched by their generosity and support.

Government holds firm to the view that we should work with the private sector in order to improve the lives of our communities. Through working with the IPP's, we have seen the lives of numerous individuals and groups in this province being changed for the better. Schools in the rural areas have also benefited tremendously by the appointment of teachers where there is a dire need. The partnership with the energy producers has also enabled

us to keep up with the latest advancement in the technological sphere, by providing up to date and state of the art computer and laboratory facilities, in schools and centres of learning. Young minds are being cultivated by the establishment of ECD Centres and crèches, and the teaching pool is strengthened by providing bursaries for further learning and improvement of qualifications, and experience. All this culminates to a greater benefit for our people and society at large. Social and enterprise development are paramount to the development of our society and to see it growing so fast and radically, is indeed heartening. The IPPs fully understand the needs of our people, and are doing amazing work with great success. We have many challenges facing our people today, and Government alone cannot provide these needs. The Northern Cape, like the rest of South Africa, still faces the triple challenges of poverty, unemployment and inequality. However, with the invaluable partnership with the IPP's, we can make continuous progress in improving the living conditions of the poorest of our people.

This publication could never tell all the "good stories" emanating from the works of the IPPs. The proof however, is all around us and it is one of hope, inspiration and cooperation. As the Northern Cape Province we treasure this cooperation and collaboration, and I am confident that the continued partnership will grow and prosper. This partnership programme bears testimony that by working together, side by side, we can and will radically transform this majestic province towards economic growth, equality and prosperity.

Sylvia Lucas



Minister Jeff Radebe Signs IPP Agreements

On Wednesday, 4 April 2018, the Department of Energy's Minister Jeff Radebe signed the Independent Power Producer (IPP) agreements for the 27 projects procured under the Renewable Energy Independent Power Producer Procurement (REIPPP) Programme. The IPP Office held a signing ceremony in celebration of this prestigious event at their Centurion offices.

The South African renewable energy climate had been rather volatile and faced with numerous challenges, hence Minister Radebe described the signing of these agreements as a "milestone following a long period of uncertainty". The 27 projects will add on the notable achievements that have been made through the implementation of the REIPPP Programme to date, with the conclusion of these agreements resulting in R56 billion of investment and about 2300 MW of generation capacity to be added to the grid over the next 5 years.

This programme proves that sustainable clean electricity at affordable prices can be provided to our communities, with the people living in and around these project areas benefiting directly. As part of the IPPs bid obligations, these projects have made commitments in five categories, namely education and skills development, social welfare, healthcare, general administration and enterprise development. These projects will contribute a total R9.8 billion to socio-economic development initiatives and R3.39 billion to enterprise development over the 20 year life time of the projects, the majority of this will be spent in local communities and involve women-owned small businesses.

The REIPPP programme has been procuring electricity at increasingly cost competitive rates with an estimated, average portfolio cost for all renewable energy technologies having dropped consistently in every bid round. It is projected that these 27 projects will provide 7 974 GWh of electricity per year, which is enough to power approximately 2.4 million average South African households, at a lower cost than what Eskom charges currently.



The Blessing of Electricity

Electricity is one of the most important blessings that science has given to mankind. One cannot imagine a world without it. Our lives have been revolutionised by it and its uses are increasing day by day. Electrical energy is the basic necessity for the economic development of a country. Many functions necessary for present-day living grind to a halt when the supply of energy stops.



The availability of huge amounts of energy in the modern times has resulted in a shorter working day, higher agricultural and industrial production, a healthier and more balanced diet and better transportation facilities. As a matter of fact, there is a close relationship between the energy used per person and his standard of living. The greater the per capita consumption of energy in a country, the higher is the standard of living of its people. Electrical energy is superior to all other forms of energy due to its versatility, effectiveness and cleanliness (no fumes, smoke or gases).

Electricity is measured in units of power called Watts, named to honor James Watt, the inventor of the steam engine. A Watt is the unit of electrical power equal to one ampere under the pressure of one volt. One Watt is a small amount of power.

Megawatts are used to measure the output of a power plant or the amount of electricity required by an entire city. The typical home uses about 7,200 kilowatt-hours of electricity each year. One megawatt (MW) = 1,000 kilowatts = 1,000,000 watts.

GENERATION OF ELECTRICAL ENERGY

Electrical energy is a manufactured commodity like clothing, furniture or tools. Just as the manufacture of a commodity involves the conversion of raw materials available in nature into the desired form, similarly electrical energy is produced from the forms of energy available in nature. However, electrical energy differs in one

important respect. Whereas other commodities may be produced at will and consumed as needed, electrical energy must be produced and transmitted to the point of use at the instant it is needed. The entire process takes only a fraction of a second.

Energy is available in various forms from different natural sources such as pressure head of water, chemical energy of fuels, nuclear energy of radioactive substances etc. All these forms of energy can be converted into electrical energy by the use of suitable arrangements. The arrangement essentially employs an alternator coupled to a prime mover. The prime mover is driven by the energy obtained from various sources *such as burning of fuel, pressure of water, force of wind etc.* For example, *chemical energy of a fuel (e.g., coal) can be used to produce steam at high temperature and pressure. The steam is fed to a prime mover which may be a steam engine or a steam turbine. The turbine converts heat energy of steam into mechanical energy which is further converted into electrical energy by the alternator. Similarly, other forms of energy can be converted into electrical energy by employing suitable machinery and equipment.*

SOURCES OF ENERGY

Since electrical energy is produced from energy available in various forms in nature, it is desirable to look into the various sources of energy. These sources of energy are:

The Sun. The Sun is the primary source of energy. The heat energy radiated by the Sun can be focused over a small area by means of reflectors. This heat can be used to raise steam and electrical energy can be produced with the help of the turbine-alternator combination.

The Wind. This method can be used where wind flows for a considerable length of time. Wind energy is used to run the turbine which drives a small generator which is arranged to charge the batteries. These batteries supply the energy when the wind stops. This method has the

advantages that maintenance and generation costs are negligible.

Water. When water is stored at a suitable place, it possesses potential energy because of the heat created. This water energy can be converted into mechanical energy with the help of water turbines. The water turbine drives the alternator which converts mechanical energy into electrical energy. This method of generation of electrical energy has become very popular because it has low production and maintenance costs.

Fuels. The main sources of energy are fuels *viz.*, solid fuel as coal, liquid fuel as oil and gas fuel as natural gas. The heat energy of these fuels is converted into mechanical energy by suitable prime movers such as steam engines, steam turbines, internal combustion engines etc. The prime mover drives the alternator which converts mechanical energy into electrical energy.

Nuclear energy. Towards the end of Second World War, it was discovered that large amounts of heat energy is liberated by the *fission* of uranium and other fissionable materials. It is estimated that heat produced by 1 kg of nuclear fuel is equal to that produced by 4500 tons of coal. The heat produced can be utilised to raise steam with suitable arrangements. The steam can run the steam turbine which in turn can drive the alternator to produce electrical energy.

"The electric light did not come from continuous improvement of candles".

- Professor Oren Harari

INTRODUCING THE WORLD RENOWNED INDEPENDENT POWER PRODUCERS OFFICE

WHO IS THE IPPO?

Staffed with an amazing team of engineers, accountants and legal experts, the Independent Power Producers Office (IPPO), works to promote the establishment of renewable energy installations in South Africa. Situated in Centurion, Gauteng, the IPPO has a staff compliment of approximately 80 personnel. Lead by a legend in the Puplic Private Partnerships (PPP) arena, in particular Renewable Energy PPP, Ms Karén Breytenbach. She is supported by her Deputy, Mr Maduna Ngobeni, who is also a reputable leader in the field.

HOW WAS THE IPPO ESTABLISHED?

Since the adoption of the Constitution in 1996 government has paved the way for the inclusion of renewable energy in South Africa's energy mix. The Integrated Resources Plan of 2010 determined the preferred energy mix with which to meet South Africa's electricity needs over the next twenty years to 2030. Furthermore, in line with South Africa's national commitment to transition to a low carbon economy, 17 800MW is expected to come from renewable energy sources. In November 2010 the Department of Energy (DoE) and the National Treasury entered into a Memorandum of Agreement with the Development Bank of South Africa (DBSA) to provide necessary support to implement the IPPP Programme and establish the office to enable sustainable energy procurement.





You cannot get through a single day without having an impact on the world around you. What you do makes a difference, and you have to decide what kind of difference you want to make.

- Jane Goodall

THE IPPO'S MANDATE?

In line with the Integrated Resource Plan of 2010, the IPPO was developed. The result of this was the production of the remarkable process called the REIPPPP, pronounced "reep", (**Renewable Energy Independent Power Producers Procurement Programme**). The programme entails a competitive auction model committing prospective IPPs (Independent Power Producers) to providing the most competitive rates in order to secure a contract. In essence, the IPPO executes the REIPPPP by administering power provider establishments in South Africa, and follows six steps in the bidding process:

1. Request for Proposals (RFP)
2. Submission of Bids.
3. Bid Evaluation and Approvals.
4. Financial Close.
5. Construction.
6. Commercial Operation.

The REIPPPP is globally recognised as the most successful and transparent plan to deliver on the renewable energy objectives of the National Development Plan, and South Africa's commitment to help fight climate change.

President of the African Development Bank, (AFDB) Akinwumi Adesina, in his address at the Bank's annual meeting in Ahmedabad in India in May 2017, said:

"I'm quite proud of what South Africa is doing in the renewable energy space. Today, the independent renewable energy power project system that was put in place by South Africa, is the best in Africa and I think it has provided us with a platform which we

can use to be able to support similar things in other countries. It's the best thing to come out of Africa in 25 years."

A noteworthy feature of the REIPPPP is the socio and economic development aspect.

Bidding companies have to commit to directing 1 - 3% of turnover towards community development projects. The result of this has been massive in those areas where there are projects. The effect of this commitment is being felt by local communities whose lives have been uplifted and changed by the social and enterprise development programmes of the renewable energy producers.

THE INCREDIBLE JOURNEY SO FAR

Globally, the renewable energy revolution is gaining momentum, and renewable resource-rich South Africa is striving to keep up. Bloomberg New Energy Finance (BNEF) recently reported that a tipping point has been reached and the world is now adding more renewable power capacity each year than new coal, natural gas, and oil capacity combined.

In December 2017, the South African government announced the successful projects in the fourth round of the renewable energy independent power producers programme (REIPPPP), bringing the total number of projects procured to 112. The 62 projects currently online are making a valuable contribution during the current power crisis South Africa is facing, and the renewable energy rollout is gathering pace in the country.

The following map shows the 112 projects from the first four rounds of the REIPPPP.

SOUTH AFRICA'S IPP RENEWABLE ENERGY PROJECTS PROCURED PER PROVINCE (as at December 2017)

	NORTHERN CAPE	59 Projects - 3 621 MWs
	EASTERN CAPE	17 Projects - 1509 MWs
	WESTERN CAPE	14 Projects - 606 MWs
	NORTH WEST	6 Projects - 280 MWs
	FREE STATE	9 Projects - 228 MWs
	LIMPOPO	3 Projects - 118 MWs
	MPUMALANGA	2 Projects - 30 MWs
	KWA-ZULU NATAL	1 Project - 17 MWs
	GAUTENG	1 Projects - 13 MWs



for more information on the 94 projects, please visit www.ipp-projects.co.za

Projects

Giving Back





#Knysna

xx

for the people



beauty
in
giving



x
^

fives

^
^

The IPPO Gives Back



The June 2017 Knysna fires saw the largest deployment of volunteers from across the country, who came to the aid of those so devastatingly affected by the disaster.

The logistics behind this devastation was bigger than anyone could imagine, with the damaged area estimated at 120 square kilometres - the vastness was so big it was unbelievable.

One of the volunteers making a massive difference in the lives of the homeless and destitute victims, was **Charmaine Rowland, a member of the IPP Office.**

Charmaine joined a group of volunteers in Knysna in June, where she was actively involved in the coordination of aid to the affected areas. Charmaine, not a novice in supporting those less fortunate than herself, worked long hours sorting donated clothes, bedding, food and toiletries. She [Charmaine] was also in regular contact with schools from George and Mossel Bay to ensure that the aid reached children in the area.

Two hundred and twenty one (221) families were without homes, mainly in the informal settlements and farms. Charmaine maintained a database that held the contact information of all who were affected, which ensured that necessary aid reached them [those affected].

"I was there for only 8 days, and I know I only saw a small part of the massive logistics that were taking place across the province and even country. A task so big but not impossible for a nation with such big hearts. In everything there is always good and so much of it can be seen already. We are truly a beautiful country who care. I am privileged to be the one to give unconditionally. Thank you IPP Office for the humbling opportunity", says Charmaine.



A legend that continues to live in the hearts of so many people across the world, Nelson Rolihlahla Mandela (or Madiba as he is so fondly known by all South Africans), was an example of what true humanity meant. He lived to serve, he lived to love, and he lived for his people.

In honour of Madiba's birthday, and his legacy, **"67 Minutes for Mandela Day"** was born. It is a day celebrated by South Africans from all walks of life across the country, and even the world, where they dedicate 67 Minutes of their time to helping those less fortunate than themselves.

As in previous years, the IPP Office dedicated their 67 minutes to the Siyazigabisa Home of Hope in Tembisa. Staff at the IPP Office generously donated non-perishable food items to the home, and handed the goods over to the children in Tembisa on 18 July.

A shelter for orphans, runaways and battered women, Siyazibabisa was started by Ms Gab'sile Khoza (pictured right), who herself was a battered woman. On her own, Ms Khoza manages the home, takes in more children from the streets, and has even reunited long lost family members. Her educational and counseling background

ensures that Ms Khoza is always there to counsel and empower the children in her care.

"I opened my heart and shared my home with what many could call strangers, it brings me fulfilment knowing that they are safe in this home", says Ms Khoza.

In the words of Madiba himself, **"And as we let our own light shine, we unconsciously give other people permission to do the same"**. Thank you Ms Khoza and the IPP Office for allowing your light to shine on others.

“

POVERTY

is not an accident. Like slavery and apartheid, it is man-made and can be removed by the actions of human beings.

- Nelson Mandela

”

67

Minutes

*In Honour of
A True Legend*







Source: Uncornered Market



NORTHERN CAPE

Northern Cape

South Africa's
largest province

Population
± 1.2 million

Capital
- Kimberley
"Diamond City"

Motto
Sa lla !aĩsi 'uĩsi
(we go to a better life)



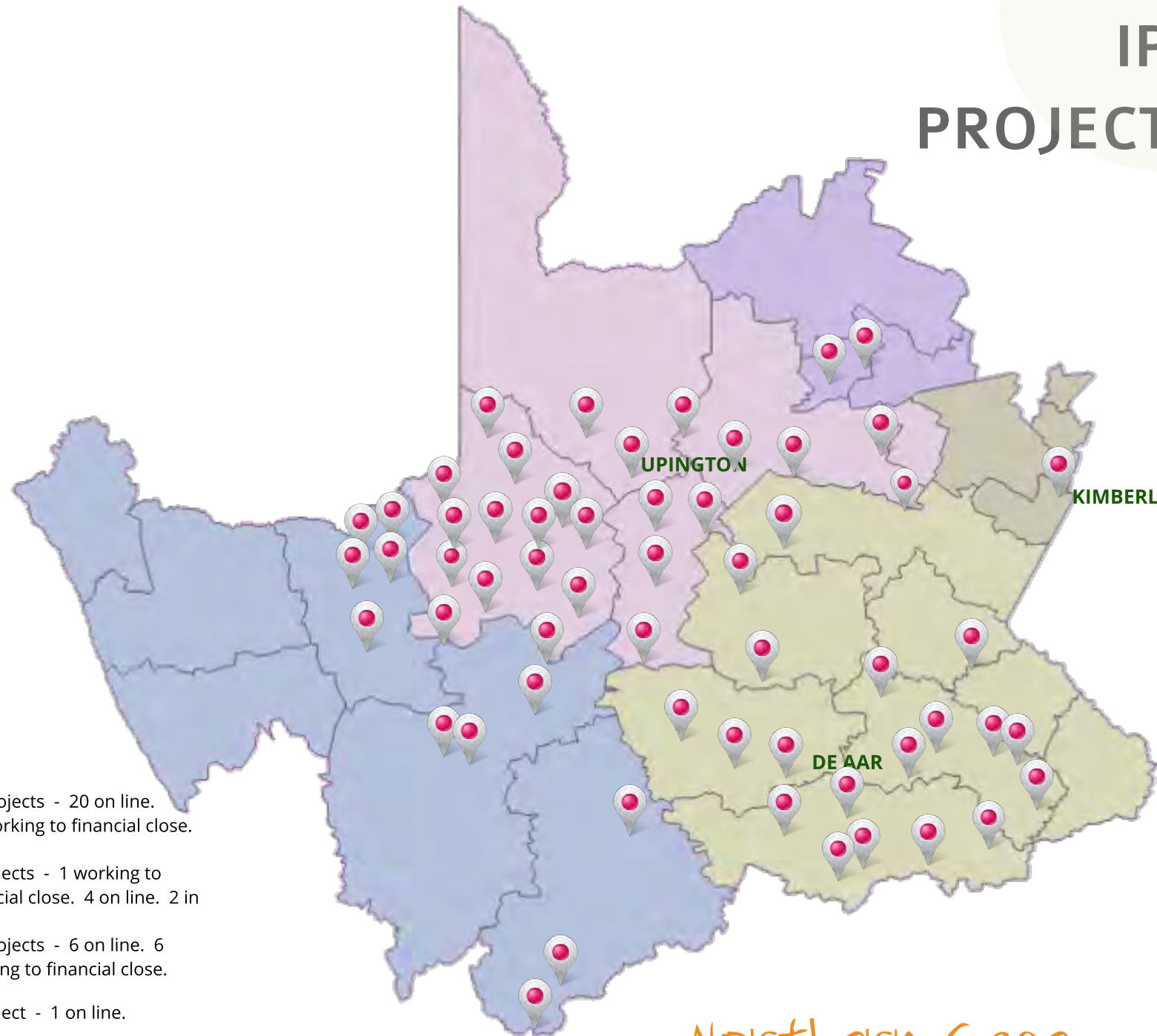
Sa lla !aĩsi 'uĩsi

Big Hole in
Kimberley

Diamond City



IPP PROJECTS



**PHOTOVOLTAIC
SOLAR (PV)**

39 Projects - 20 on line.
19 working to financial close.



**CONCENTRATED SOLAR
POWER (CSP)**

7 Projects - 1 working to
financial close. 4 on line. 2 in



WIND POWER

12 Projects - 6 on line. 6
working to financial close.



SMALL HYDRO

1 Project - 1 on line.

"Change will not come if we wait for
some other person or some other time.
We are the ones we've been waiting for.
We are the change that we seek."

– Barack Obama



S.A. Renewable plant wins UN Award at COP23

SA's KaXu Solar One, situated in the Northern Cape, is a 100MW plant. It is the first concentrated solar power plant in the country, which can generate electricity as well as store energy.

The KaXu (Ka-to) Solar One concentrated solar power (CSP) project, in the Northern Cape, was recently presented with a **Momentum for Change Award by the UN Framework Convention on Climate Change (COP). The award was presented at COP23, in Bonn, Germany.**

KaXu is constructed on a 1,100ha site near Pofadder. It was recognised under the Financing for Climate Friendly Investment category as one of 19 "**Lighthouse Activity of the Year**" projects receiving an award in 2017.

KaXu is one of the first batch of 28 renewable energy projects unveiled by the Department of Energy in 2011. It is also the first CSP plant in SA to use parabolic trough technology. This entails the use of parabolic mirrors to reflect and concentrate the sun's rays to produce heat, which then generates steam that powers turbines and produces electricity (pictured on the left).

Energy storage allows the plant to produce firm, base-load electricity even when the sun is not shining, offering a remarkable low-carbon solution.

The project was officially opened in March 2015 and supplies clean energy to the equivalent of 80,000 homes while offsetting 315,000 tonnes of carbon dioxide emissions a year.

SA has set a goal of generating up to 17,800MW of renewable energy by 2030 to reduce its dependence on oil and natural gas resources. The country's reliance of coal-driven power stations is the main reason why it is the 12th highest contributor to greenhouse gas emissions in the world.

KaXu is jointly owned by Abengoa Solar (51%), the Industrial Development Corporation (29%), and a community trust (20%).

The project, which created 4,500 temporary and 80 permanent jobs, is structured on a fully commercial basis. All the power is sold to Eskom under a power purchase agreement. Its uniqueness lies in its ability to supply base-load power, something that wind farms or solar photovoltaic (PV) plants cannot do and which has a significant economic value to the grid.

Each year, the Momentum for Change award recognises innovation and game-changing projects that address climate change and wider economic, social and environmental challenges.

Mafalda Duarte, head of the \$8bn Climate Investment Funds (CIF), highlighted what the award means for SA: "***The recognition underscores how concerted actions by a government can enable significant mobilisation of private-sector financial flows towards renewable energy technologies, including critically important base-load components of the energy systems.***"

Well done KaXu!

Achievement

STAR IN THE SKY

‘A star in the sky’! These are words used by one learner in Mctaggartskamp Primary School in Upington, when describing the first concentrated solar tower power plant in Africa.

KhiSolar One, situated 20km northwest of Upington in the Northern Cape, provides 50MW of energy to 45 000 South African households.

KhiSolar One prides itself with its effective socio-economic development programme (SED) in the communities in and around Upington. Their strong belief in education as the most significant tool to make changes in the society, guides their way to develop strong SED projects. This is evidently seen by the number of school projects they are involved with in the local communities where the plant is situated.

Mctaggartskamp Primary School is no exception. It accommodates 117 learners with five teachers and three non-educators. The school is a Roman Catholic built school, and has been operating for 67 years. KhiSolar One's relationship with the school dates back to 2015, when they first installed security lights and burglar doors. The school experienced many burglaries prior to this, which resulted in the loss of school equipment and resources.

Another challenge facing the school was the lack of administration space. KhiSolar One came on board to extend an area which was previously used for filing, office administration as well as the school Principal's office. The Principal now has his own office, which he uses to hold meetings with school governing bodies, parents and

one-on-one with the learners.

An Administration Clerk who used to share the office with the Principal, expressed how grateful she was to have more space for filing and other administration activities for the school.

“I am happy because now the Principal has a decent office and we no longer use one door for reception and the same for the Principal 's office, she can now have private meetings with the parents and important people”, she said. She has been working at the school for four years and is appreciative of the work that KhiSolar One has done to help enhance the teaching environment for the learners.



IT'S COOL INSIDE



Just a few kilometers outside Blauwskop, lies a very small community called Bloemsmond. **KhiSolar One** took their socio-economic development call and attended the needs of a primary school in the area. Bloemsmond Primary School is a grade 1 to 6 no-fee paying school, which accommodates 51 learners. The School has only three teachers and one Administration Clerk. The school might be small but it has important needs that will make learning and teaching a much more interesting and exciting activity for both the learners and teachers.



Identifying the need for better teaching facilities, **KhiSolar One** provided a state of the art mobile classroom, equipped with a much needed air conditioner, for the grade R learners. The school's grade R teacher, related the story on how the mobile classroom had a major impact on her teaching. She could not stop expressing how honoured they were to have received it. "Thank you **KhiSolar One**, we love the new classroom", she added.



Education



Technology

at their fingertips

Grobblershoop High School is one of the key beneficiaries of Bokpoort CSP plant in Grobblershoop. The high school which was initially built for 60 learners, now accommodates over 400. These are learners from local communities, whose parents mainly work on the farms in and around Grobblershoop.

An enthusiastic Grade 11 learner, Sylvester Ludick, sits quietly in the computer lab, working on his activity for the computer application subject. He explains how having a computer lab makes it easier for him to do research for his assignments and projects. The grade 11 teacher also shared that the children from the rural school have little exposure to the modern world, however, having access to the computer and Internet, has started to change all of that.

Bokpoort CSP is a concentrated solar thermal plant located near Groblershoop, and produces 50 MW of base load energy to the national grid.

Bokpoort CSP intends to have a long lasting relationship with the school, and will continue to maintain the computer lab, and will provide additional Internet access for the lab. Impressively, the school achieved a 100% matric pass rate in 2016. They thanked **Bokpoort CSP** for assisting them in attaining this remarkable pass rate.



EDUCATION IS THE KEY TO
UNLOCKING THE WORLD,
A PASSPORT TO FREEDOM!

Oprah Winfrey



A Woman with Purpose

'Marietjie se Skoonmaak' is the proud beneficiary of a cleaning business opportunity from **Kakamas Hydro Electric Power (KHEP)**.

Managed under the project called Neusberg Hydro, which is situated in Kakamas, this project is a run-of river power station that uses the natural flow and drop in elevation of a river to produce electricity.

KHEP generates 10 MW of base load energy, enough to provide power to approximately 5 000 households.

Marietjie Matroos, is the sole owner of *'Marietjiese Skoonmaak Dienste (MSD)'*. She is a mother of seven children and the only breadwinner.

Through its socio-economic development programme, **KHEP** afforded Marietjie a two year cleaning service contract at the hydro plant. The 42 year old is at the plant full time and works from Monday to Friday. With this opportunity Marietjie is now able to support her family and she still has extra income to purchase cleaning equipment for her growing cleaning company.

Marietjie conveyed appreciation to **KHEP** for the business opportunity. She plans to expand and develop her business by employing additional staff.

They Print Miracles

“With the constant support from **Lesedi Power**, we are able to take on bigger projects and compete with other printing companies in Postmasburg town”, says businessman Lesley Rens of Renznz Creation .

In the township of Boitshoko, in the Postmasburg district, Northern Cape, the unemployment rate is rapidly increasing. As if this wasn't bad enough, more and more young people are getting involved in crime and drugs. These were some of the pertinent concerns Lesley raised during our visit to his studio.

Renznz Creations is a 100% black owned and managed company that specialise in printing graphics, vehicle decals, stickers, silk-screening, road signs, safety signs, perspex lettering, light boxes and banners. This is one of the projects

Lesedi Power Project is supporting as part of the community enrichment program.

Lesedi Power Plant, is a solar operation located in Kimberley, and produces 75 MW of electricity to the national grid.

Lesedi Power became involved with Renznz Creations in 2010 and not only do they continuously provide business advice to the company they also purchased materials and an industrial printing machine to make their jobs easier.

“With the constant support from Lesedi Power Project, we are able to take on bigger projects and compete with other printing companies in Postmasburg town”, says Lesley. Renznz Creations contributes positively to the community by changing the livelihood of young families. Eight individuals from the community are employed by Renznz Creations on a permanent basis. “Since I started working here, I’m able to financially support my wife and kids”, says Dennis, one of the staff members hired by Renznz Creations.

“I’m so grateful to Lesedi Power Project for providing me the right resources and support to continue fostering my community. Without them I don’t know what I and my employees would be doing, I’m incredibly thankful,” remarks owner Lesley.



WATER
OUR
MOST
PRECIOUS
RESOURCE

Aries Solar Plant, with an installed capacity of 9.65MW, is located on a 20-hectare site approximately 36km southwest of the town Kenhardt in the Northern Cape Province. Kenhardt is one of **Aries Solar PV's** hosting communities, and is receiving support from the project.

Aries Solar's main mission was to identify projects in the rural area that needed attention. One of the projects carried-out was the construction of a fence around the water supply facility in Kenhardt.

"The community was particularly concerned about the contamination of water and most importantly the safety of the children. The best way to solve this problem was to fence the area completely", says Mr Mackay, a representative of **Aries Solar PV**.

When the Ward Councilor Ms Stella Fritz heard that the IPP Office team was in town, she made it a priority to meet with us at the water supply facility. She wanted to personally express her appreciation for all the community work Aries Solar is involved in. She was exceptionally delighted and offered her continued support to **Aries Solar**, the renewable energy programme, as well as her community.

Viva, Aries Solar, Viva!

WHEN CLEAN
WATER IS
LIFE



Community



FOOD GROWS WHERE THE WATER FLOWS



Aries Solar Plant is surrounded by small and medium sized farms. The area is cruel. Nothing grows except wild grass and cacti. The soil is loose and infertile. The sun beats down mercilessly and the livestock cleverly spend time in the shade of the thorn trees. A major problem experienced by farmers was water supply, or the lack thereof. They had no choice but to carry water in their vehicles from the local river, to their farms, often having to hire the transport.

Ms Januarie, Chairperson of the Kenhardt Farmers Union, was happy to escort the IPPO team to a community project about 12 miles outside the town. During the trip she spoke about the dilemma of the farmers at the mercy of the elements and how some farmers were losing stock due to the water problems. She added were it not for the **Aries Project**, many farmers would have to abandon their efforts.

To lighten the load, so to speak, Aries has provided large water tanks to the community. The tanks are fed from a pump at the river about 3 kilometers away, they in turn supply water to six small farms.

The project has also provided heavy duty water troughs to hydrate the thirsty animals.

"I'm very thankful and appreciate all the support that Aries Solar Plant is giving us." adds Ms Januarie

Ms Januarie adds that the project rescued these struggling farmers and made a great impact on their future. They are now motivated again and will soon become productive members of their community. All thanks to **ARIES SOLAR PLANT** and renewable energy.

ACCESS TO WATER MADE EASIER



Just outside the town of Grobbelaarshoop lies the informal settlement of Top Line, situated across the highway from the Orange river.

The residents of this small, quaint community, were faced with a daily struggle to provide their loved ones with fresh, clear water. Transporting water from the river in various containers, proved to be a tedious, laborious and dangerous task. Sadly this resulted in the deaths of some of the residents when crossing the highway to get to the river.

Bokpoort Concentrated Solar Project was alerted to their plight and offered to find a way to make life easier for the community.

The first step in the process was the employment of a local plumber, who had pipeline laying experience. Bokpoort then approved the laying of a pipeline 1.8 km from the river to the settlement. A further 15 local residents were employed as part of the project team.

Today every house has a tap and plenty of water for domestic use. The water is also used to develop crops, keep some livestock or just to water their gardens.

This project has had a tremendous impact on the residents and dramatically improved the lives of the residents. Resultantly **BOKPOORT CSP** is held in high esteem by the residents as all their lives were changed by this little gesture.

PAYING IT FORWARD

Far into the outskirts of

Kakamas stands another old municipal house, like all the rest, except for the gathering of elderly ladies seeking shade under a tree in the yard. They welcome the IPPO team with open arms and invite them into the home garage. But this is no ordinary garage at all – it has been converted into a fully fitted kitchen, capable of cooking for large groups. A large stove, refrigerator, lots of cupboards, a large table, chairs, tiled floors and a great big three-legged pot fills the room.

The Rauch Service Centre for the Aged situated at the home of one of their members, provides a second home for the aged. They have 43 registered members aged between 55 and 88 years age. They say that they are alone at home all day, and are often disrespected by family and the youth, who only visit when they are hungry, need somewhere to go, to share some gossip or seek advice on domestic and other issues.

The group proudly tells you that they are now one big family, and able to help other groups such as the crèche children or the youth. They also have a strong team that participates in the annual Golden Age Games where they have won many awards. Bead-work and other crafts keep them busy, and fulfilled. A cyber service also aids the aged whenever necessary, and Sunday Bible study, led by the local pastor is high on this group's agenda.

They quickly add that they owe it all to the local renewable energy project on whom they heaped their appreciation for the tremendous boost given their group. The **Kakamas Hydro Electric Project (KHEP)**, situated nearby, is responsible for all this. They have reached into the heart of the community and uplifted a struggling group of aged and noble residents and given them new hope and aspirations for the future.

The group leader, Janey says, **"We had nothing until KHEP came and helped us. We are strong and have so much, now we can help others, thanks to KHEP. We pray for all of them at KHEP. Thank you KHEP, thank you!"**



gas

of

are

are

GAME CHANGER

Mayor Maria Daniels

Mayor Maria Daniels, from the Tsantsabane district, cuts a very simple figure seated behind her large desk. She reflects an image of simplicity but quickly turns on the serious side expressing sincere concern and love for the people she serves.

She begins by describing her constituency and reveals detailed knowledge, understanding and concern for the people amongst whom she lives. There are no innuendos or pauses as she explains the dilemma facing her district. She adds that the locals are poorly educated, facing serious unemployment, living in abject poverty

and experiencing the effects of the lack of infrastructure. The youth are without drive or ambition and are easy victims of the drug trade.

The aged are lost souls in a sea of suffering and we have limited means, and much to achieve.

However, since the arrival of the Jasper Solar Project much has changed for the community. Jasper changed the attitude that this was a lost people.

Jasper Solar PV is situated close to Postmasberg in the Northern Cape, and generates 75 MW to the national grid.







WESTERN CAPE

Western Cape

South Africa's
4th largest
province

Population
± 6.5 million

Capital
- *Cape Town*
"Mother City"

Motto
"Spes Bona"
(good hope)

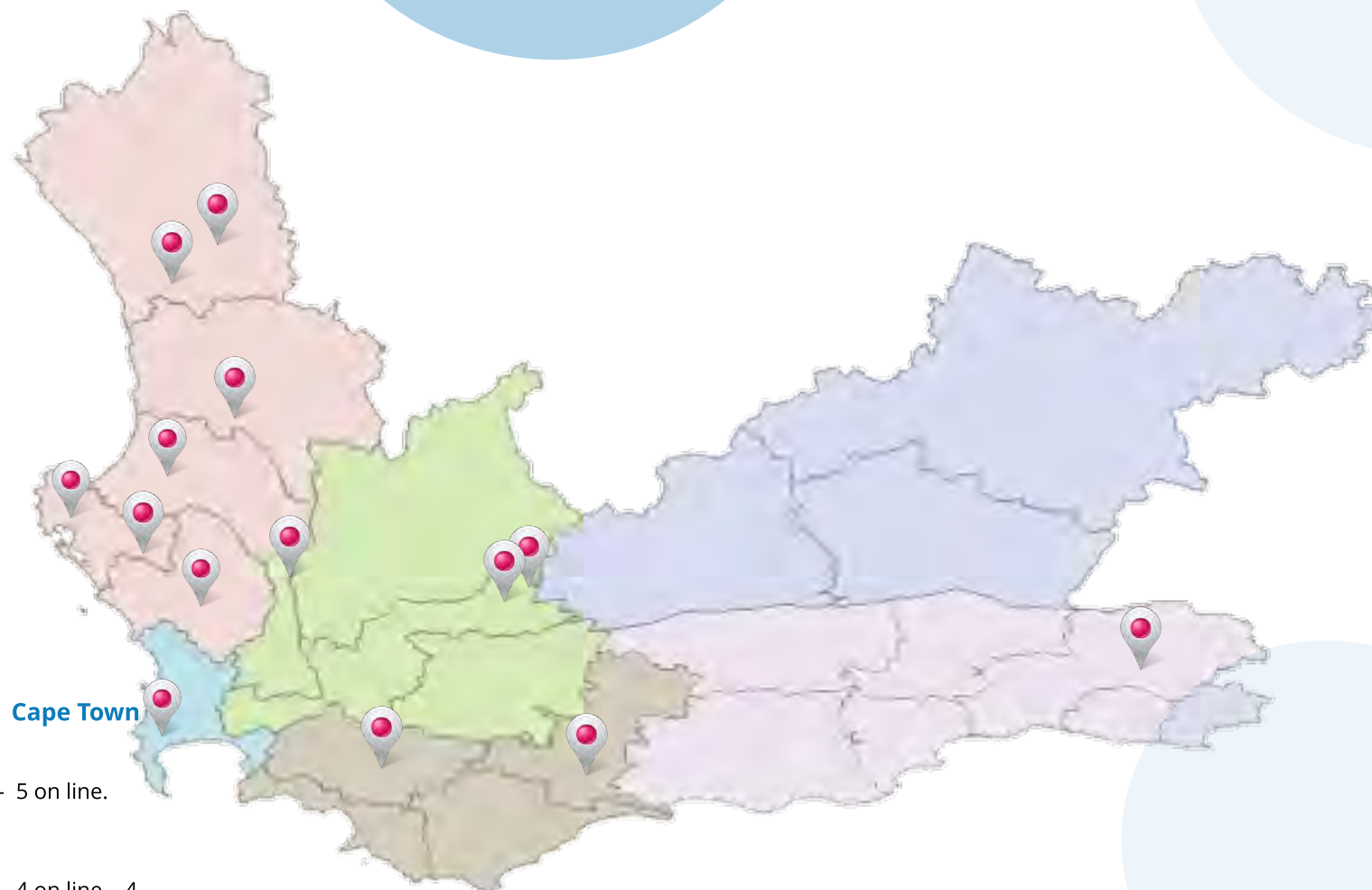


Spes Bona

Robben Island

Mother City

IPP PROJECTS



**PHOTOVOLTAIC
SOLAR (PV)**

5 Projects - 5 on line.



WIND POWER

8 Projects - 4 on line. 4
working to financial close.



BIOMASS

1 Project - 1 working to
financial close.

Western Cape



TURBINES

a wind-wind

SOLUTION

**FOR THE LOVE
OF THE CHILDREN**

**IT TAKES A VILLAGE
TO RAISE A CHILD**

- African Proverb -

Slimsun Solar is situated close to the town of Darling in the Western Cape and generates 5 MW to the national grid. This plant has gone to great lengths to support and uplift local communities, and find great satisfaction and reward in doing so.

Learners enjoying their new computer room



Recently Slimsun assisted the local primary school, **Goedehoop Primary School**, by upgrading the computer room. They furthermore provided a server to control the many computers, thus enabling the teacher to be more effective in the class. The computers have opened a new world to these rural kids, expanding their minds and developing future leaders.



Christine van Zyl (left) with sponsored teacher, Elize Pieters



The plant has also assisted the school by upgrading the qualifications of one of the teachers. Ms Elize Pieters received funding to continue her studies at UNISA, where she is studying a BA Degree in Foundation Studies. Ms Pieters' qualification and new found knowledge will go a long way in improving the standards at the school.

Slimsun CEO, Anthony Corin (right), with Principal Pieters of Goedehoop Primary



Slimsun was also instrumental in assisting the **Bloemendal Primary School** by upgrading a container, that had been donated to the school, that now boasts an impressive library, where the little ones can not only improve their reading, but also get their imaginations flowing. The functional facility was mounted and set in such a way, to provide easy access to the kids. **Slimsun** furthermore installed a large carport in front of the container, that provides much needed shade for the 80+ pupils. The new facility has been gratefully welcomed by the principal and pupils alike. To add to the fun and excitement, the learners will assist an artist with the painting of murals on the container - making their mark.





Think it



Shine bright like a diamond

With the knowledge gained, Bonita grew in confidence, and in December 2016 received funding to start her dream catering and events management business, aptly called **"Bonita Sparkles"**.

Bonita has used the funding to procure centre pieces, cutlery, glassware, a trailer, fairy lights, linen, a red carpet, sheet covers, a laptop and a printer.

Her growing business has also afforded others with employment opportunities. She currently employs one individual, and has aspiration to employ more in the future.

She has done an outstanding job, taking all things into consideration, and she proudly averages a turnover of R5000 per month. Bonita's events are of the highest quality, and she has received numerous compliments.

"I am humbled by, and thankful for the way the Gouda Wind Farm and the Eli group has positively impacted the entire set up of my event management business. I can now express my passion, learning powerful tools to grow my business and also give back to my community." says Bonita.

Well done Gouda Wind and Eli Group!

Gouda Wind Farm Facility is situated in the very rural area of central Western Cape. It generates 136 MW to the national grid.

As part of **Gouda Wind Energy Facility's** enterprise development programme, they introduced an intense business incubation programme in August 2016.

Bonita Bam, an aspiring events planner, was selected by the ELI Group to participate in the incubation programme.

Bonita hails from Saron, a humble town in the Western Cape. She is a bubbly, optimistic and talented small business owner who enjoys bringing joy to others through the work she does.

Over the past 11 months ELI has been mentoring Bonita in the files of finance, business management and marketing, amongst other business specialties.

Love it

Do it



ENTREPRENEUR

Don't just say it **SEW** it



Sofia Joemat stood out like a ray of sunshine during the week-long Labit Academy in August 2016. Her positive attitude, beaming smile, and carefully crafted leather handbags made her an easy pick as one of three entrepreneurs to form part of Labit's incubation programme.



The Labit team were immediately blown away by her ambition and hunger to make her business a success. She dreamed big, and found the means to make them a reality. The contribution made by **Acciona / Gouda Wind Farm** was essentially the key she had been waiting for, enabling her to buy the correct equipment to expand her product range, to include soft-leather products.

Shortly into the period of incubation, the Labit team realised that they had discovered a gem in Tulbagh. Sofia had come from a humble upbringing, and had left primary school at an early stage, but her tenacity and resilience propelled her to the future she dreamed of. She managed to secure a training position at Woodheads Leather in Cape Town, where she was mentored and trained in leather craft. The contribution she made to her community, led her to receiving an award from the Department of Environmental affairs.

The incubation programme has seen her grow from hobbyist to Hand Made Leather Product Retailer, through her company "SEW" (a play on the name Sofia).

Her brand is a beautiful personification of the humble, phenomenal woman, who will always be rooted in the simplicity of creating leather craft. A sewing needle might be the tiniest of implements, but it became a mighty tool in the hands of a woman designing a better future for herself and her community.

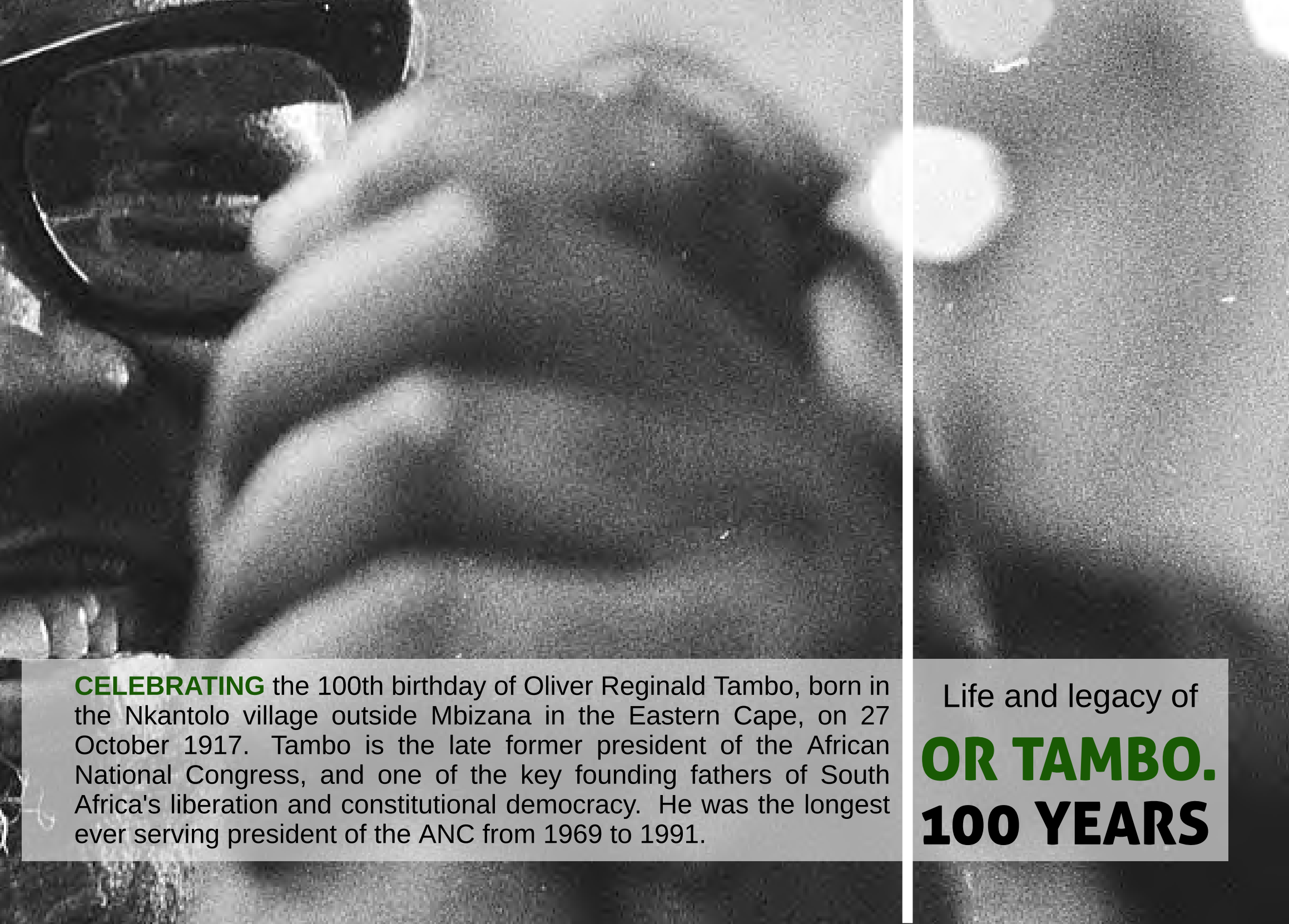
Sofia's next goal is to refine her skill in order to become an internationally accepted brand, that will bring hope to her community, and create sustainable employment in a town of desperation. Her story and craft has already sparked interest, and her products will soon be available in a leading leather product retailer in Paarl, who has a national footprint.



PRENEUR







CELEBRATING the 100th birthday of Oliver Reginald Tambo, born in the Nkantolo village outside Mbizana in the Eastern Cape, on 27 October 1917. Tambo is the late former president of the African National Congress, and one of the key founding fathers of South Africa's liberation and constitutional democracy. He was the longest ever serving president of the ANC from 1969 to 1991.

Life and legacy of
OR TAMBO.
100 YEARS



Learners from Naasdrift Primary School in Vredendal

Enabling families to work and survive knowing that their children are cared for, is a major issue in the town of Vredendal, situated on the border of the Western and Northern Cape provinces.

The tight knit community is warm and friendly, and they remain positive and upbeat despite the hardships they face on a daily basis.

Supporting the community in which they operate, is one of Vredendal Solar's driving ambitions. One such exciting project was to develop and fund the **Sonskyn Speel Sentrum**. Funding provided has enabled the purchase of mattresses, furniture and salaries of four assistants that take care of the 60 children. A quaint kitchen further enhances the lives of the little ones.

Sadly the abuse of women and children, is one of the social ills that haunts this small community. Drugs and alcohol, and the lack of support for abused individuals, further exasperates their plight. **Vredendal Solar**, realising the severity of the situation, and the great need for support, set-up a **place of safety** for those affected. The home

provides relief for both individuals and families, where they find sanctuary and safety. To-date 48 women, some with children, have passed through the home. The patients also receive counselling and some sort of empowerment for future employment. The stories of abuse are too intense to mention, but even a little abuse remains abuse, and is unacceptable.

Many rural schools experience staffing issues, ranging from teachers not wanting to go to rural areas, to a shortage of personnel budget. To circumnavigate this dire situation, **Vredendal Solar** came to the rescue of the **Naasdrift Primary School**. They provided the school with a much needed social worker, as well as a Grade R Teacher. The principal expressed her sincerest gratitude and appreciation to **Vredendal Solar** for their wonderful support.

CHANGING LIVES



Principal of Naasdrift Primary School pictured here with staff provided by Vredendal Solar

From left to right: Solet Mass (teacher); Maria Coetzee (principal); Marietjie Engelbrecht (social worker); Leentjie Niemann (cleaner); Sharifa Rhode (community liaison officer)



The SONSKYN Speel Sentrum made possible by Vredendal Solar

SUCH DARLINGS

Sinetemba is a home care and outreach centre based in Darling in the Western Cape. They perform excellent community service by providing medical advice and treatment to the elderly and the infirm. They do, however, confirm that they assist anybody in need, be it medical or otherwise. This vital community service centre has 50 home care personnel who go door to door assisting those needing help. ***"Without the aid of Slimsun Solar, we would find it very difficult. Thank you, Slimsun."***

Slimsun Solar plays a prominent role in the Swartland area by supporting the local communities wherever they can. Prior to Slimsun this community suffered with unemployment due to seasonal farm work and poor service delivery. Little could be achieved due to a shortage of resources. **Slimsun** helped change some of this by supporting large local events such as community and sports events. Another contribution made was the support of a local farmworker who became Farmworker of the Year, which has led to him being promoted to a manager. **Slimsun** has also touched many lives with its range of projects.

***"We are constantly looking for persons or communities we can assist",
Anthony Corin, CEO Slimsun Solar.***



Aurora is a rural Western Cape town with a population of 600. There is almost zero employment opportunity and many are seasonal farm workers. Their plight is dire, and seeing their children suffer is especially taxing.

Recognising the need for funding and support in this friendly community, **Aurora Solar** began interacting with the towns leaders. They simply had to identify ways in which to improve the residents livelihoods.

Aurora Solar's continued interaction with the Women's Aurora Network, has made it possible for them (**Aurora Solar**) to have access to various individuals and clubs in town. The Women's network forms part of the community trust fund and have access to available money, they use for various courses and projects in the community. A few of the projects/clubs supported by the community trust are listed below.

- Two senior rugby teams are sponsored with travel costs and full kits.
- A project has been launched to teach local residents to drive. To date 48 individuals are involved.
- An aspiring student has been sponsored for 2nd year studies in Business Management at Unisa.
- A social worker has been funded by the plant to assist the community.
- The trust provides food parcels to the workers when wine farms are closed.
- The Trust also provides transport and other assistance to the elderly women to participate in the very popular Golden Oldies Games.

A major success for the plant was the launch of **Sonstraaltjies Kleutersskool**, providing a crèche which it has fully funded. Four workers are employed to care for the kids. Two of the teachers are studying Childcare at Western Cape Technikon. The crèche makes it possible for parents to seek work knowing that their children are safe. The intention is to acquire suitable municipal property to progress to a community centre for the teaching of ABET to the adults and a meeting place for other groups.



Teachers from Sonstraaltjies
Kleutersskool
sponsored by Aurora Solar



DayCare Centre in Aurora
sponsored by Aurora Solar



Randall Pieters, rugby
coach for Aurora

HOPEFIELD BRINGING HOPE

WHEN A PLAN
COMES TOGETHER -
THE COMMUNITY
BENEFITS.

Hopefield Onshore Wind Farm, situated on the West Coast, produces 6 MW of energy.

Hopefield Wind lives by its promise to give back to the people in the communities in which they operate. What an excellent example of social and enterprise development created to uplift an entire community.

Through various projects, over 600 underprivileged families were happy to receive RDP homes. Sadly, these homes were poorly built, with plumbing, electricity and ceilings incomplete. The homes were in serious disrepair and posed a health hazard for the residents.

Hopefield came to their rescue with an ingenious plan that has proven to be very successful and is in continued implementation. A business model, consisting of 2 phases was developed and implemented, in order to fix the homes. In phase 1 they employed and trained 18 local residents and trained them in the fields of plumbing, electrical, etc. The individuals trained up to Level 1 artisans. Three of these candidates were selected to proceed to Phase 2 of the model. In Phase 2, they were further trained in business management and other relevant subjects. They were then given start up financial support to register and run their own companies, that now employs the remaining 15 learners from Phase 1.

To date over 150 homes have been fully repaired and progress indicates that the same number will be completed in 2018.

A new ceiling board product was fitted to shield against the harsh weather. The homes of the most deserving,

such as the aged and infirm, were given priority. A home of six individuals, who previously had to bath by heating a kettle, had solar geysers and bathrooms installed.

One resident commented that her respiratory illness had subsided considerably since the installation of the new ceiling boards. Another stated that she feels much safer now with proper certified electricity. All of this had been fully funded by **Hopefield Wind Farm.**

Another environmental project involves the funding support given to SAN Parks for the eradication of dangerous invader plant species threatening the region. This also helps provide work for the local residents.

Thank you Hopefield Wind Farm!

Community







EASTERN CAPE

Eastern Cape

South Africa's
2nd largest
province

Population
± 6.4 million

Capital
- *Bisho*
"Buffalo City"

Motto
*"development
through unity"*

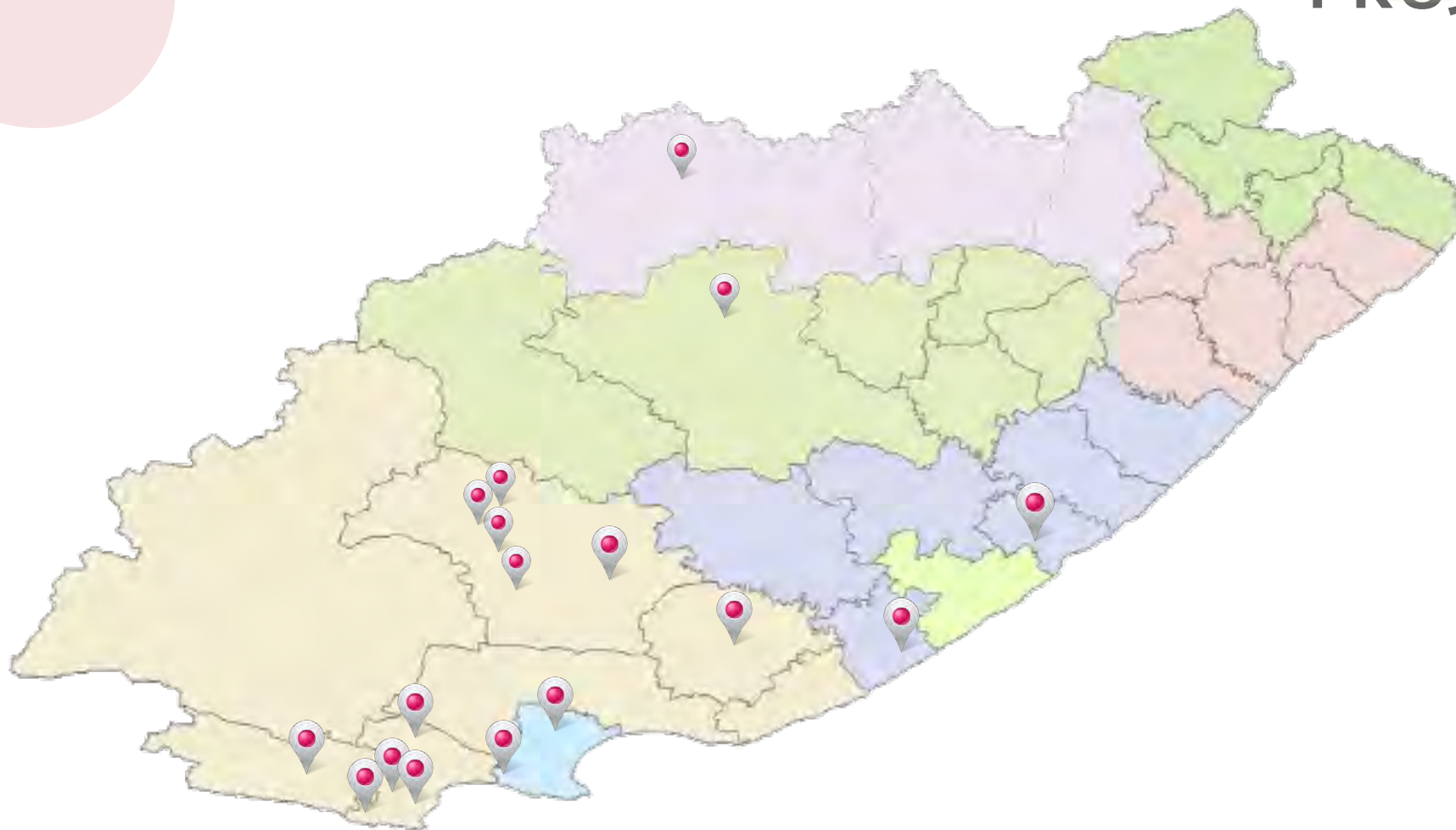


Wild Coast

Hole in the Wall

Windy City

IPP PROJECTS



**PHOTOVOLTAIC
SOLAR (PV)**

1 Project - 1 on line.



WIND POWER

16 Projects - 12 on line. 4
working to financial close.

perfection in print

Linea Brand, a graphic design and signage rigging company, was established in 2012 by Lubabalo Majika.

Lubabalo grew up in the community of Motherwell, and was concerned by the rate of youth unemployment. He was determined to bring about change by creating job opportunities. Recognizing the need for graphic design and signage rigging services in the community, he went to work to make his dream a reality.

One of Linea's core mandates is to positively impact the economy by creating sustainable jobs, and encouraging entrepreneurship, with the belief that "township economy is big business".

Not stopping at graphic design and signage, Linea also offers services such as printing, music video productions and t-shirt printing.

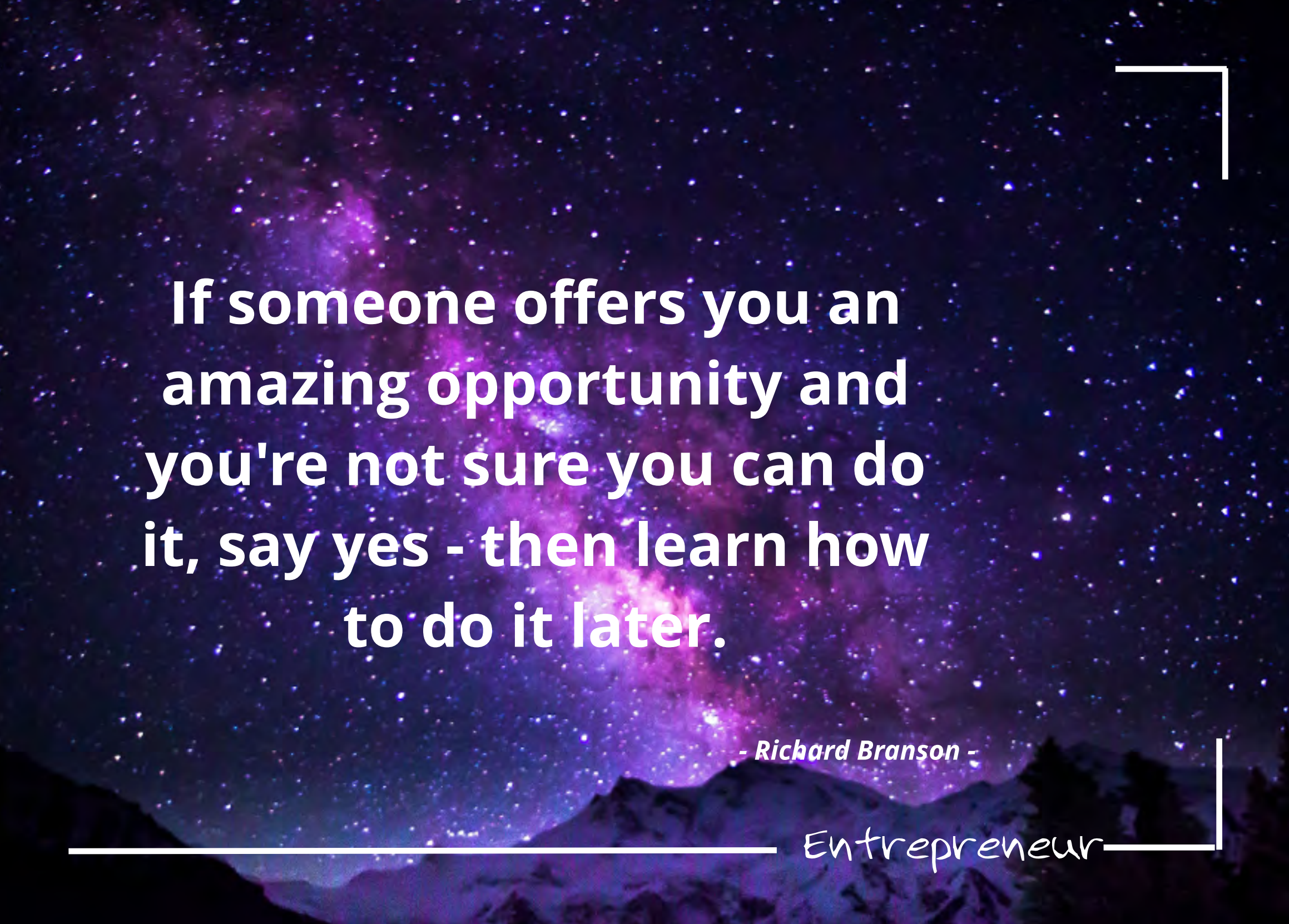
Starting a business, however, is not without its challenges. Lubabalo's company had a shortage of equipment and other vital resources, which restricted the growth of the company.

Through the benevolence of **Grassridge Wind Power**, Linea has been able to develop. Grassridge Wind Power has provided Linea expensive printing equipment and stationery. Their further offering of skills development, has allowed each Linea employee to better understand and improve the skills, which in turn has improved production turnaround time, and has reduced outsourcing costs.

The company [Linea], has grown phenomenally, and has secured new business premises where they are exposed to a larger market. Within

one year, Linea has created three permanent, and seven contract employment opportunities for local individuals. Linea has also secured multiple large contracts, thus ensuring sustainability and growth for both the community, and the country as a whole.





**If someone offers you an
amazing opportunity and
you're not sure you can do
it, say yes - then learn how
to do it later.**

- Richard Branson -

Entrepreneur





LIMPOPO

Limpopo

South Africa's
5th largest
province

Population
± 5.7 million

Capital
- Polokwane
"City of the Stars"

Motto
*"peace, unity
and prosperity"*



*Diphororo Tsa
Meetse*

Tsonga Women
of Limpopo

*Strong Gushing
Waterfalls*

IPP PROJECTS



**PHOTOVOLTAIC
SOLAR (PV)**

3 Projects - 3 on line.



COAL

1 working to financial close.

Limpopo



HIS FUTURE IS BRIGHT

Learning by candle light is a thing of the past for little Siphso, thanks to the power of renewable energy in his small community in the Limpopo Province.

Siphso dreams of one day becoming a doctor, and works hard at school. Sadly his determination has been stifled due to the lack of adequate educational resources.

Inequality of access to educational resources in previously disadvantaged schools, is a reality across South Africa. As a result, learners in these rural areas, have been disadvantaged due to the gap in learning areas.

Early Childhood Development (ECD), develops areas such as fine motor skills (sense of touch, hearing, vision, smell, etc.) in children aged 5 to 9. The skills obtained have a significant impact on the children's lives at a later stage, as these senses develop their cognitive abilities.

Witkop PV Solar Plant, situated in Polokwane, has recognised the great need for these learning resources, in the community in which they operate.

Twenty Five Educational Circuits, which are within a 50 km radius from their plant, have been established. Thirteen of these circuits have been supplied with the toolkits, cabinets and training needed to support the 166 schools in the area.

The tools provided are in line with the Curriculum and Assessment Policy Statement (CAPS), and are designed to achieve a certain learning outcome. The toolkit encourages learners to learn through touch/doing – it has been found that learners learn much faster this way.

This Concrete → Pictorial → Abstract approach, enables learners to encounter mathematics in a meaningful way, and translates mathematical skills from the concrete to the abstract. This approach allows the learners to understand mathematical concepts before learning the methodical expressions.

The learner support materials will assist the ECD teacher in achieving Mathematics Learning Outcomes by engaging learners in interesting activities. The material further caters for differentiation and promoting logical thinking that is essential for mathematical reasoning.

A good education has the potential to increase the South African economy by making more of the population employable. The youth, through education, will have the opportunities they could only dream of, making them valuable contributors to the future development of South Africa.

Witkop PV Solar Plant, through their contribution to their community, have gone a long way to support this future development. Thank you Witkop!



Education





GAUTENG

Gauteng

South Africa's
smallest province

Population
± 14.2 million

Capital
- *Tshwane*
"Jacaranda City"

Motto
"unity in diversity"



PLACE OF GOLD

Union Buildings

Jacaranda City



IPP PROJECTS



1 Project with 5 plants: 3 on line. 2 plants in construction.

Gauteng



Energy Johannesburg, is an Independent Power Producer based in Braamfontein, Johannesburg, Gauteng. In partnership with the City of Johannesburg and their PikitUp landfill sites, Energy Johannesburg has developed several landfill gas to electricity projects. These projects form part of the Department of Energy's Renewable Energy Independent Power Producers Procurement Programme (REIPPPP).



They [Energy Johannesburg], have gas extraction plants in landfills in Robinson Deep, Linbro Park, Goudkoppies, Marie Louise and Ennerdale. Methane gas produced by rotting and decaying rubbish is channelled into extraction plants where it is converted into electricity.

Over and above Energy Johannesburg's contribution and commitment to green, clean energy, they have several socio-economic development initiatives that they have implemented as part of the REIPPP Programme.




Focussing on communities within a 50 km radius from each project site, Energy Johannesburg have concentrated all its efforts on improving education facilities that serve the various areas.

Turffontein Primary School, was identified as one of the schools which would benefit from their improving education initiative. Sitting on broken chairs and sharing desks, often with four or five children to a desk, or even having no desk at all, Turffontein Primary School was in desperate need of new furniture. Energy Johannesburg remedied the situation immediately, and provided Turffontein Primary School with the much needed desks and chairs.



The benefits of this programme, far out way any financial implications, as it is able to provide suitable, durable resources. This in turn allows the children to focus on their studies, thereby achieving better grades, and one day contributing to the growth of South Africa.

Thank you Energy Johannesburg!

A young boy with a bright smile, wearing a pink short-sleeved school shirt and purple shorts, sits on a white plastic bucket. He has his hands clasped in front of him. The background is a brown wall with a chalkboard that has the alphabet (A-Z) written in white chalk. To the right of the boy is a traditional wooden stool with a flat top. The overall scene suggests a school environment in a rural or developing area.

Expanding their horizons

Education





KWA-ZULLU NIATAL

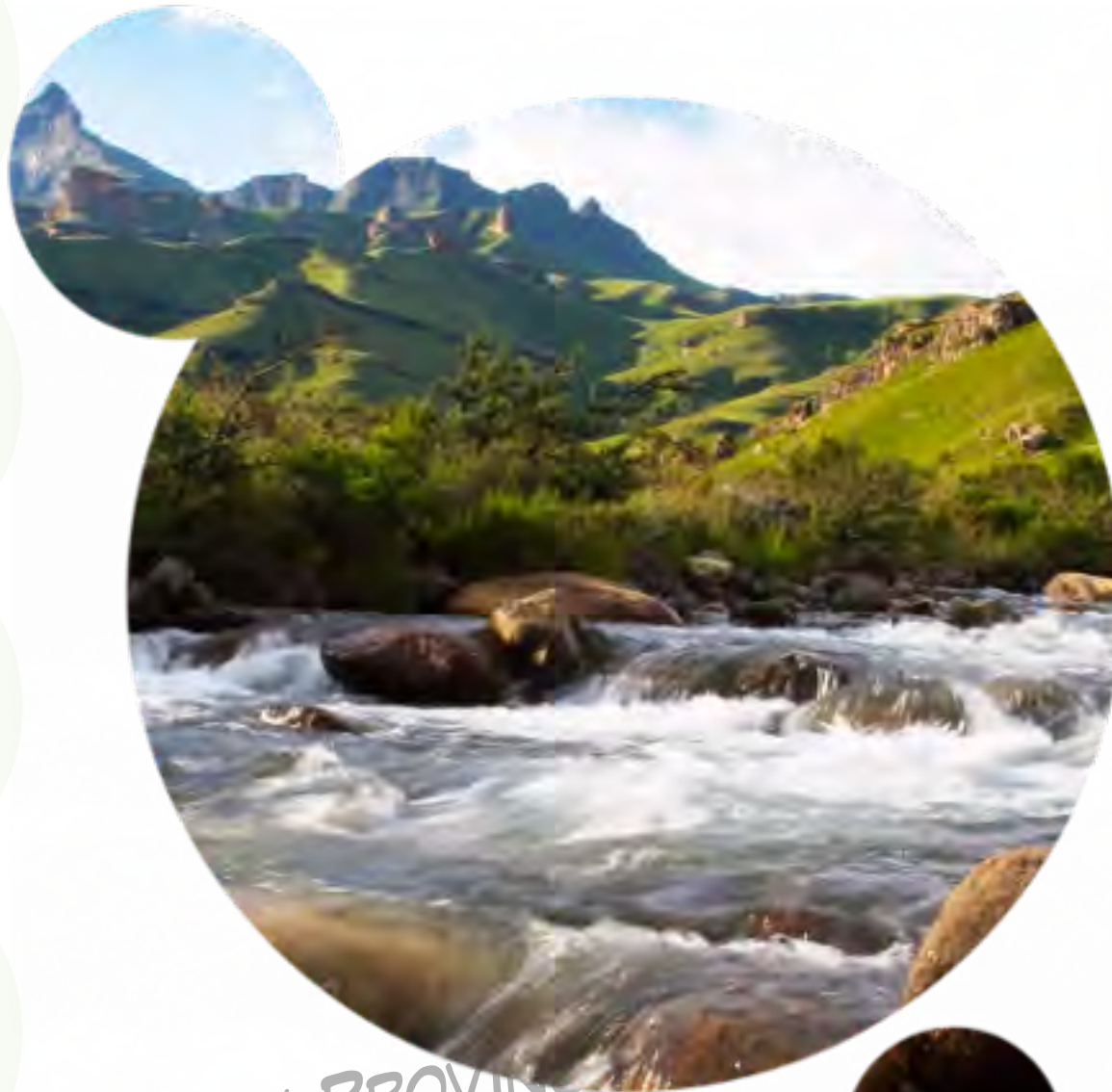
KwaZulu Natal

South Africa's
7th largest
province

Population
± 11 million

Capital
- *Pietermaritzburg*
"City of Flowers"

Motto
*Masisukum
Sakhe*
(let us stand up and
build)



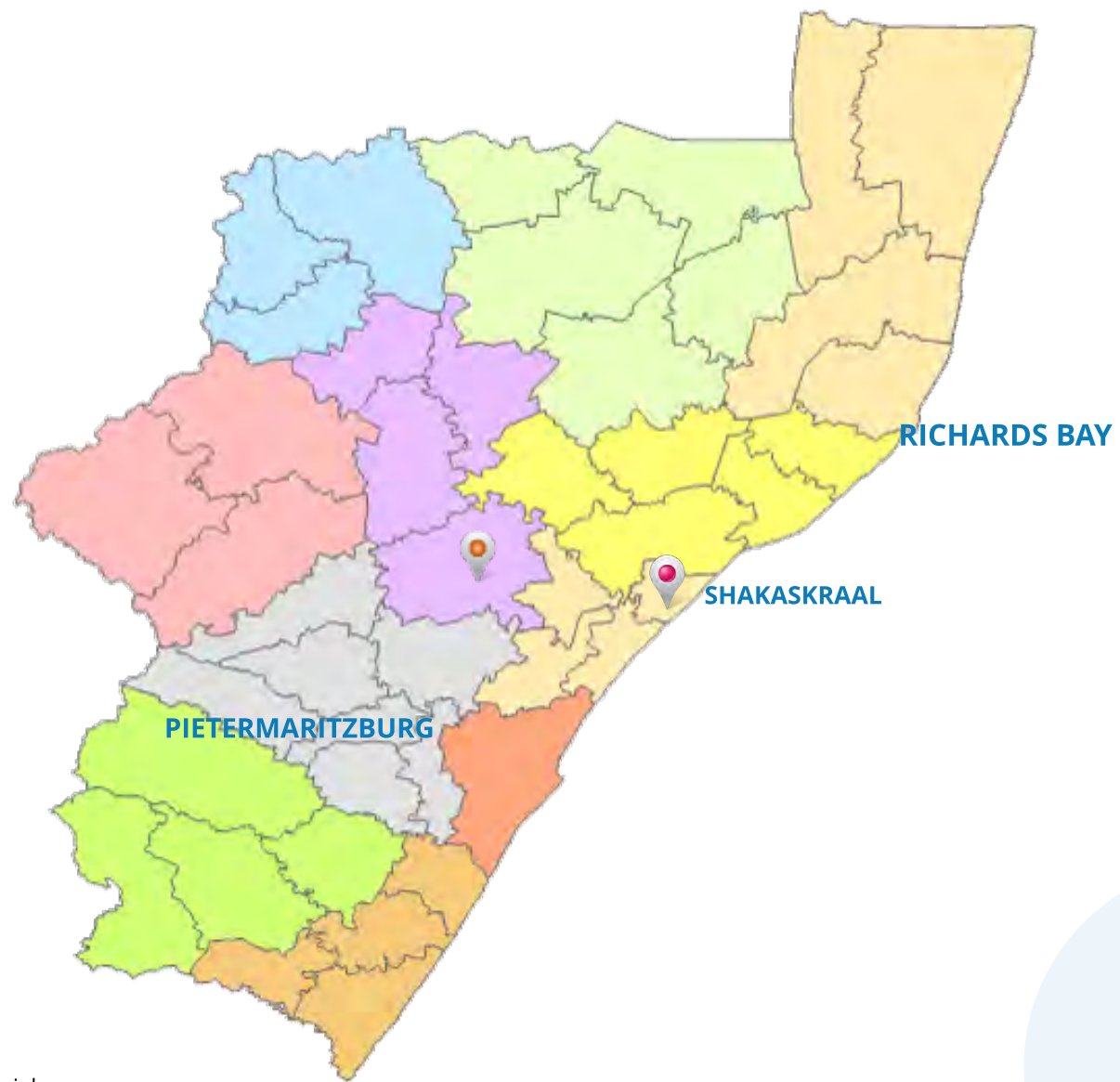
Zulu Kingdom

Drakensburg
Mountains

GARDEN PROVINCE



IPP PROJECTS



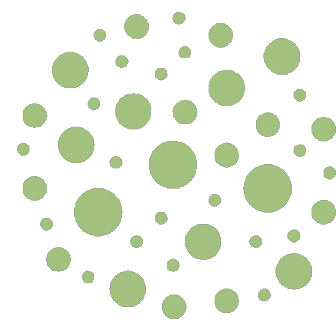
BIOMASS

1 Project - 1 working to financial close.

KwaZulu Natal



EMPOWERING YOUNG GIRLS



“wathintha abafazi, wathinta imbokoda, a Zulu phrase meaning “ *when you strike a woman, you strike a rock*”. The phrase has come to represent South Africa’s women, and their courage and strength.

Sadly, there are a number of obstacles that women in South Africa encounter that hinder their growth and contribution to society, such as gender inequality, abuse, etc. Women need to be celebrated, and young girls need to learn from an early age that they are valuable, powerful and deserving of every chance and opportunity in the world.

In August 2016, **Avon Peaking Power**, situated in Shakaskraal, embarked on a programme to overcome this obstacle. The programme saw girls from five high schools (Guzana, Groutville, Nonhlevu, Qoqulwazi and Sinenhlanhla) close to Avon’s project, provided with sanitary pads for six months.

The teenage phase is a fundamental stage of a woman’s life, this is when she is discovering a lot about herself, especially her body. Confidence is key and Avon aims to ensure that a young girls’ self-belief is built.

Studies have shown that young girls in rural areas, miss

approximately 50 school days due to lack of sanitary pads at their disposal, a basic necessity that many take for granted.


Lack of sanitary pads is one of the difficulties causing girls to miss school and many girls from impoverished backgrounds cannot afford these. The lack of affordable sanitary products for girls and women keeps them at a disadvantage in terms of education when they are young, and prevents their mobility and productivity as women.

In ensuring that the programme is sustainable, Avon continued with the project in 2017, during **Women’s Month**. Over 3 000 girls from the 5 high schools were provided with sanitary pads for 8 months, enough to see them through the school examinations in 2017, and beyond.

Every girl in South Africa deserves access to safe and hygienic sanitary products. Avon Peaking Power’s goal is to **help girls reclaim the dignity that poverty denies them**, and will enable them to make a lasting, positive impact on the communities they live in, and society as a whole.

Thank you Avon for your remarkable contribution to South Africa’s future!

Education



**THE FUTURE
DEPENDS
ON WHAT YOU DO
TODAY**

- MAHATMA GANDHI

One brick at a time!



Themba with his new bulldozer purchased for his business by Avon Peaking Power

Themba Khumalo is a small construction business owner from rural Kwa-Zulu Natal (KZN). He [Themba] established his company with the aim to provide comprehensive services to the construction industry in KZN, and thereby creating job opportunities in his community.

Lack of adequate construction equipment has often resulted in Themba not being able to secure business, which has had a negative impact on potential growth.

Recognising the need for this type of business in the area, and the great potential it has in giving back to the community, **Avon Peaking Power** got involved by providing various construction equipment through their supplier development programme.

Located in Shakaskraal, 65 km North of Durban in KwaZulu Natal, Avon Peaking Power reached full commercial operation of its 670

MW power plant in July 2017.

The Open Cycle Gas Turbine plant consists of 4 units and is jointly owned by **ENGIE**, black majority owned **Legend Power Solutions**, **Mitsui** and the **Peakers Trust** (representing the local community). The plant lay-out allows for flexibility with regards to future conversion using gas-fired technology, and as such is part of South Africa's gas-to-power development plans.

As part of its Socio Economic Development programme, Avon has identified a number of worthy project, Themba's being one of them.

The contribution by Avon, has resulted in Themba creating employment opportunities by employing a driver and expanding on the services offered by the company.

Well done Themba and Avon!





FREE STATE

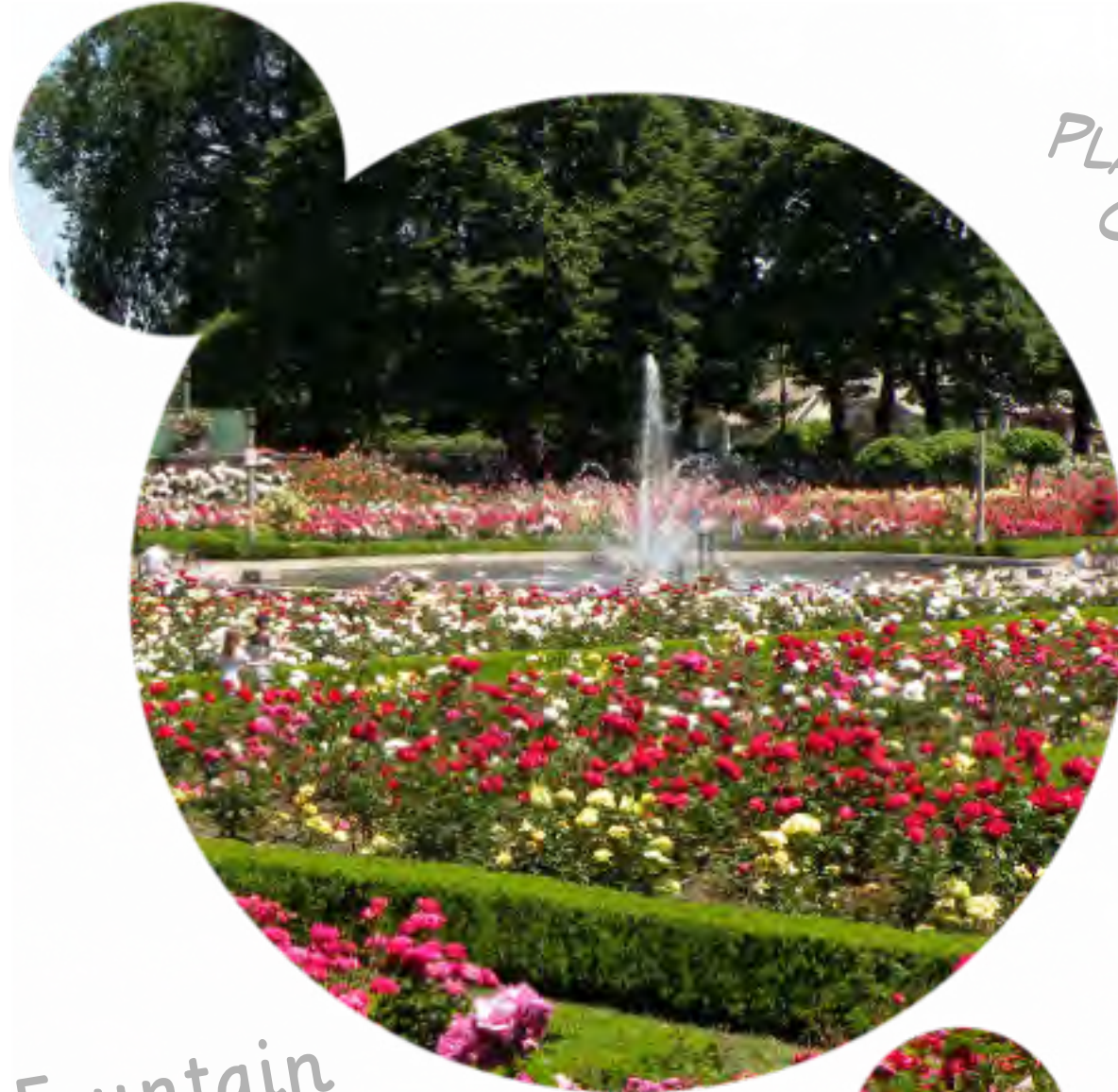
Free State

South Africa's
3rd largest
province

Population
± 2.8 million

Capital
- *Manguang*
"City of Roses"

Motto
*Katleho ka
kopano*
(*success through
unity*)



PLACE OF THE
CHEETAH

Rose Garden

Fountain
of Flowers



IPP PROJECTS



 **PHOTOVOLTAIC
SOLAR (PV)**

7 Projects - 3 on line. 4 working to financial close.

 **SMALL HYDRO**

2 Projects - 1 on line. 1 working to financial close.

Free State

LETSATSI POWER PROJECT 'POWERS' VISANNAH DESIGN STUDIO

Visannah Design Studio is a small medium enterprise in Bloemfontein owned and operated by Mr Viwe Kota and his wife. The business was launched in 1999, after Viwe pursued his dream of being a fashion designer by enrolling for a Fashion Designing Course. He paid for his own tuition from a part-time job as a petrol attendant with a dream to one day establish his own business.


After the business was established, it was not short of challenges and financial constraints which led Viwe to approach the **Letsatsi Power Plant (IPP)** and various institutions seeking financial assistance to purchase equipment for his business. The IPP initially purchased sewing equipment for the business in 2015 and subsequently bought a four-headed embroidery machine. The embroidery machine purchased by Letsatsi Power Project allows for the embroidery of more than 40 items per hour as compared to the old machine which took approximately one hour to embroid just one logo.

Through the assistance of **Letsatsi Power Plant**, Visannah Design Studio was able to expand its business operation including taking embroidery for other small businesses. Some of its clients include the Rutanang Primary School in Rocklands Bloemfontein where the business has been contracted to design and sew new school uniforms for students.

Visannah Design Studio has also contributed to combating unemployment in its surrounding areas, the business has employed five permanent staff and it employs eight contract workers each time the business secures a contract. Viwe's business has allowed him to dream ever bigger, with an ultimate goal of owning a bigger factory and employ over two hundred people and to also supply to chain stores country wide one day.

Letsatsi Power Project is delighted and proud of Visannah Design Studio and the direction it's headed, and they will continue to support the business.





I put my money on
the sun and solar
energy. What a
source of power!

*- Thomas Edison
(1931)*





NORTH WEST

North West

South Africa's
6th largest
province

Population
± 3.8 million

Capital
- *Mahikeng*
"City of Goodwill"

Motto
*Kogiso le
Tswelelopele*
(peace and prosperity)



Platinum
Province

Palace of the
Lost City
(Sun City)

Cattle Farming



IPP PROJECTS



RUSTENBURG

MAHIKENG



**PHOTOVOLTAIC
SOLAR (PV)**

6 Projects - 1 on line. 5 working
to financial close.

North West

LEADING THE WAY

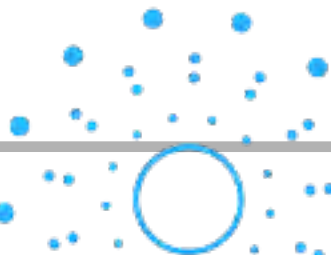
RustMo1 Solar Farm (RustMo1) is an independent power producer, situated in Marikana in the North-West Province of South Africa.

The villages of Mmaditlhokwa and Lapologang are the nearest communities situated within a ten-kilometre radius of the seven-megawatt solar farm. These communities suffer with high-poverty, with over 40% unemployment, and lacks basic infrastructure and services. **RustMo1** has chosen to focus its socio-economic development initiatives within these two mining communities.

RustMo1 has been successful operating since 2013 in this community, and we have employed over seventy percent of our staff from the local community.

The developers had the vision to set up a community trust, that would participate in the ownership of this solar farm.

The **Momentous Foundation** owns seventeen percent of the solar farm, with the beneficiaries being the local communities, that would participate in dividends of the company over its twenty-year lifespan.





The local primary school **Retief Primary School** offers hope to the young children of these communities.

RustMo1 has over the years supported the school with maintenance, infrastructure, painting, lighting, printers, chalkboards, and supported the children with school uniforms, shoes, jerseys; and supported other requests from the school.

RustMo1 also partnered with the FET College in Rustenburg, where youth from the local community were sponsored to study engineering at the college.

A more formalised Experience Works Programme (EWP) has since being implemented. The IDC has also shown an interest in this programme and has provided additional funding. Youth development was identified as a priority by both communities and the EWP was identified as the best option to address youth development.



The EWP is a two-phase programme that includes entrepreneurial training as well as access to internship opportunities. Twenty youth have joined the programme, with the hope that they could join formal employment or establish their own businesses.



Education





MPUMALANGA

Mpumalanga

South Africa's
8th largest
province

Population
± 4.4 million

Capital
- *Mbombela*
"Citrus City"

Motto
*Omnia Labor
Vincit*
(labour will conquer all)



PLACE WHERE
THE SUN RISES

Kruger National
Park

Big Five



IPP PROJECTS



BIOMASS 2 Projects working to financial close

Mapumalanga



“Our children are the rock on which our future will be built, our greatest asset as a nation. They will be the leaders of our country, the creators of our national wealth who care for and protect our people”.

-Nelson Mandela (3 June 1995)

#bethelegend



*And as we let our own
light shine, we
unconsciously give other
people permission to do
the same.*

- Nelson Mandela



Thank You!

The IPP Office would like to thank our Minister of Energy, the Honourable Mr. Jeff Radebe, MP, and the Premier of the Northern Cape, Honourable Ms. Sylvia Lucas, for their invaluable time and contribution to the second edition of the "Sakhisizwe".

Thanks also goes to:

Joey Rai (Editor & Writer)

Moloko Masenya (Researcher & Writer)

Jerry Nzimande (Researcher & Writer)

Des Otto (Design & Layout)

Special Thanks once again to all the Independent Power Producers and the community members for sharing their amazing stories with us.

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SOUTH AFRICA



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