

# Shopping Clean

Retailers and Renewable Energy - An Update November 2016



Massmart  
+  
Walmart



© Growthpoint Property. Bayside Mall Solar PV Installation, 2016.



GREENPEACE

*“In order to fully benefit from the potential of renewable energy in South Africa, companies need to step out of their comfort zones and send clear signals to the markets by committing to an ambitious 100% renewable energy future.”*

- Shopping Clean: Retailers and Renewable Energy

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**Commissioned by:** Greenpeace Africa

**Published:** October 2016 by Greenpeace Africa

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**Designed by:** Kaitoma Creatives

*Printed on 100% recycled post-consumer paper with vegetable based inks.*

In the wake of an extended electricity crisis (characterised by load shedding and rolling blackouts), it is clear that South Africa's current electricity system - based almost entirely on coal and nuclear produced by Eskom - is failing the people of this country. The national utility's inability to deliver reliable, affordable, clean electricity has led to massive economic losses. At the same time, the current catastrophic drought and skyrocketing food prices makes it clear that climate change is a real and present danger which can only be addressed through a low carbon pathway. Renewable energy offers a concrete alternative to the current electricity system, but at the moment investments are almost entirely limited to the country's Renewable Energy Independent Power Producers Procurement Programme (REIPPPP), and

significant barriers to rooftop solar remain. In fact, during the course of 2016, Eskom has begun what appears to be a sustained anti renewable energy campaign, which increases the need for other sectors, including the retail sector, to champion and lobby for a renewable energy future in South Africa.

Despite Eskom's best efforts to call renewable energy into question, reports released by the Department of Energy indicate that the solar radiation resource in South Africa is one of the highest in the world. This means that solar energy must be seen as a key solution to rising electricity costs as solar technology advances and the costs of these systems rapidly decline.



# THE RETAIL SECTOR'S ROLE IN A SOUTH AFRICAN ENERGY REVOLUTION

South Africa's retail sector plays an important role in society and has developed over time to meet the changing needs of the country. As such, this update of the report released by Greenpeace Africa in April 2016 titled "*Shopping Clean – Retailers and Renewable Energy*"<sup>1</sup> highlights the important role that South Africa's top five retailers (Shoprite, Massmart, Pick n Pay, Spar and Woolworths) should play in developing the renewable energy industry, by committing to a target of powering their operations with 100% renewable energy, and becoming Renewable Energy Champions.

This update details the current state of renewable energy investments and commitments from each of the five retailers and provides information as to how they can achieve a 100% renewable energy target in the future. The retailers have been ranked on four key criteria relating to renewable energy, which clearly indicates where they need to improve in the future. These are: energy transparency, commitment to renewable energy, greenhouse gas mitigation, and lobbying for clean energy.

## How Woolworths, Massmart, Pick n Pay, Spar and Shoprite Stack Up

Table 1 shows how three of the five retailers have improved since April 2016. Woolworths still leads the way with a score of 6 out of 10, their 'commitment to renewable energy' score has improved owing to the PV installation undertaken at their Midrand distribution center during 2016. Massmart's score out of 10 has also seen a significant improvement from April 2016, jumping up two full points from 3.5 to 5.5. Massmart has shown an improved commitment to renewable energy through the

installation of two solar PV systems in 2016. Both Woolworths and Massmart's scores were materially affected by their commitment to lobby for renewable energy as discussed below. Woolworths is still the only retailer that has taken the critical step of publicly committing to achieve 100% renewable energy by 2030, further improvements to their score will be possible when their plan to reach their 100% renewable energy targets - with short term and long term goals - is in place, and is in implementation.

Prior to the release of *Shopping Clean: Retailers and Renewable Energy*, Pick n Pay had not engaged with Greenpeace regarding renewable energy issues, or our Renewable Energy Champions campaign. Engagement between Pick n Pay and Greenpeace is now taking place and this has led to an increase in the retailers' energy transparency score. Pick n Pay's score was also materially affected by their commitment to lobby for renewable energy.

Spar's score has remained the same as they have not made any progress in the renewable energy space in 2016.











Shoprite continues to have the lowest score as insufficient information is publicly available on their energy usage, and they have not engaged with Greenpeace Africa on these issues till this day. Some information is now available through their website describing two solar PV installations that were installed in 2016, and this information has since been verified by the retailer. However, more detailed information has not been provided, and Shoprite has not agreed to meet with Greenpeace to discuss this report or our campaign. They are thus ranked below all the other retailers.



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<sup>1</sup> To download the full report please follow this link: <http://www.greenpeace.org/africa/en/Press-Centre-Hub/Publications/Shopping-Clean/>

# Table 1: Renewable Energy Ranking for South African Retailers\*

	 Overall Score out of 10 <sup>vii</sup>	 Energy Transparency	 Commitment to Renewable Energy	 Greenhouse Gas Mitigation	 Lobbying for Renewable Energy
	↑ 6	C	↑ B	D	↑ C
Massmart + Walmart <sup>2</sup> 	↑ 5.5	C	↑ C	D	↑ C
	↑ 5	↑ C	D	D	↑ C
	1.5	D	F	E	F
	↑ 1	F	↑ E	↑ E	F

\* Improvements in scores are reflected through red arrows next to the score.

<sup>2</sup> Group brands include Game, Game Foodco, DionWired, Makro, Fruitspot, Builders Warehouse, Builders Express, Builders Trade Depot, Builders Superstore, CBW, Cambridge Food, Jumbo Cash and Carry, Valumart, Liquorland, Trident, Rhino and Shield.



## Current Renewable Energy Investments

Woolworth's total energy usage for all their corporate stores, international (Mauritius) head office buildings and distribution centres increased by 3.4% from 444 545.37MWh to 460 103.54MWh in 2015, this has been attributed to an increase in the group's footprint as well as an increase in reporting efficiency. During 2014 Woolworths upgraded the solar panel installation at their head office, and during 2015 the installation provided 246 059kWh of electricity which equates to roughly 10% of total electricity consumption in the head office. In 2016 the City of Cape Town announced the decommissioning of the Darling Windfarm, which had been providing Woolworths with renewable energy credits. Options in terms of solar projects are being explored to provide the Woolworths Financial Services building with renewable energy that was previously bought through Renewable Energy Credits from the City of Cape Town. The solar PV installed at Woolworths distribution centre in Melbourne, Australia, generated 319 422 kWh of electricity in its first year of operation.

## Energy Efficiency

Woolworths has reduced their relative electricity usage by 40% across stores and by 31% in corporate buildings, against targets of 40% and 35% respectively. This has been calculated using 2004 as the base year.

## Planned Future Renewable Energy Investments

The first phase of the Midrand distribution centre solar PV installation has taken place with 1MW currently installed. The second phase was delayed but will take place in the next 18 months. The planned installation will be 2MW of solar PV, providing between 26-34% of the centre's energy needs per annum. Woolworths has committed to a solar PV installation at their Cape Town distribution center which will take place during 2017, the exact scope of this installation is still to be finalised.

## Current Targets

Woolworths has met its strategic sustainability commitments that were set for the period of 2007 – 2015. The commitments for the next phase of the Good Business Journey indicate that Woolworths will halve their energy impact by 2020 and source all their energy from renewables by 2030. Woolworths has committed to producing an electricity plan with short-term and long-term targets to achieve this ambitious 100% commitment by the end of 2016.

## Renewable Energy Advocacy

Woolworths has included a dedicated stakeholder relationship manager into their team who focuses on strategies to engage with policy makers on issues that impact the retailers' business. The main purpose of this role is to share initiatives and learnings with various government departments, and Greenpeace believes there is a great deal of potential for this role to significantly contribute to renewable energy lobbying in the future.

Woolworths participated in the retailer round table hosted by Greenpeace Africa in July 2016. At this meeting all three retailers (Woolworths, Massmart and Pick n Pay) agreed that a need exists for a holistic sector approach that includes financial mechanisms and regulatory frameworks to create an enabling framework for renewable energy going forward, and thus to lobby collectively for this. Woolworths took part in the initial conversation with the National Business Initiative (NBI) to discuss lobbying for renewable energy as a retailer collective.

The NBI will be proposing key intervention points related to the NBI's strategy to engage government on energy issues. How Woolworths takes up these initiatives at the highest levels, and drives them forward will be instrumental in their future lobbying efforts, but significant steps forward have been taken. Greenpeace believes that the NBI is one potential forum for the retailers to engage on energy issues through, but it is imperative that additional avenues through Business Unity South Africa (BUSA) and the Consumer Goods Council of South Africa (CGCSA) are also pursued.

## Energy Transparency

Woolworths voluntarily provides information to the Carbon Disclosure Project (CDP) Climate Change programme which is listed on the CDP website and is publicly available. This information is also verified by a third party audit firm. The 2016 Good Business Journey report also provides a good summary of carbon emissions, energy efficiency measures, targets and proposed initiatives; this report is publicly available. Woolworth's position statement on climate change is also available through their website, and is progressive in terms of recognising the retail sectors contribution to climate change and the fact that the sector has a role to play in mitigating and adapting to climate change. However, it is critical that this is matched by the retailer's action on climate change, and interventions to help South Africa shift away from coal and towards renewable energy.

# Massmart + Walmart

## Current Renewable Energy Investments

Massmart's electricity consumption has increased by 8% from 426876.40MWh to 464371.50MWh in 2015; this has been attributed to improvements in data collection and the inclusion of stores in Africa. The increase in electricity consumption in South Africa is attributed to the high temperatures experienced during the reporting period which led to increased consumption for refrigeration and ambient air cooling.

Massmart has installed a 520kW solar photovoltaic (PV) system at their new Carnival Mall Makro store, this installation provides an estimated 25 - 35% of the store's energy requirements. A retrofit of their Woodmead Makro store is currently underway and will host a 430kW solar PV system upon completion. Due to Eskom's current inconsistent and disincentivising approach to solar PV installations<sup>3</sup>, Massmart was unable to carry out their planned solar PV installation at their Rivonia Builders Warehouse store, they have therefore changed the site of this installation to the Northriding Builders Warehouse store, but this change has led to a massive delay in installation.

## Energy Efficiency

Massmart has not updated their energy efficiency targets, as stated in the report *Shopping Clean: Retailers and Renewable Energy*, Massmart has reached an overall energy efficiency of 18.7%. This means that they are overshooting their goal of 10% and indicates that the group needs to set more ambitious targets going forward. The 2020 targets are still in place and have not changed, however the group is currently discussing the feasibility of increasing these targets.

## Planned Future Renewable Energy Investments

Due to the challenges experienced at the Rivonia Builders Warehouse, Massmart have decided to take renewable energy projects on a case by case basis until Eskom has a small and micro generation framework in place and a more conducive and incentivised environment is created. Massmart has indicated that they will continue rolling out projects, but in the absence of a predictable renewable energy framework from Eskom they will not put targets in place at this time.

## Current Targets

Massmart currently only has targets for energy efficiency, and as discussed in the section above these targets are set for the year 2020.

Greenpeace strongly maintains that the targets currently in place for Massmart are not ambitious enough, and that the pilot solar PV projects must be utilised to generate a roll out plan with targets for solar PV in the shortest possible timeframe.

## Renewable Energy Advocacy

As part of the process to get approval for the three pilot solar PV projects, Massmart has been engaging with both Eskom and local authorities around renewable energy policy and protocols. This process does not however involve formalised structures and discussions around policy changes, but is rather on a project by project basis. Massmart was one of three retailers who participated in the retailer round table hosted by Greenpeace Africa in July 2016. In this meeting all three retailers agreed that a need exists for a holistic sector approach, which includes financial mechanisms and regulatory frameworks to create an enabling framework for renewable energy going forward, and thus to lobby collectively for this. Massmart has been instrumental in setting up initial meetings with the NBI to discuss lobbying for renewable energy as a retailer collective, as discussed above in the Woolworths section.

The NBI will be proposing key intervention points related to the NBI's strategy to engage government on energy issues. How Massmart takes up these initiatives at the highest levels, and drives them forward will be instrumental in their future lobbying efforts, but significant steps forward have been taken.

Greenpeace believes that the NBI is one potential forum for the retailers to engage on energy issues through, but it is imperative that additional avenues through BUSA and CGCSA are also pursued.

## Energy Transparency

Massmart submitted information voluntarily to the Carbon Disclosure Project (CDP) Climate Change programme in 2016. This information has been verified by an independent auditing firm and is publicly available through the CDP website.

<sup>3</sup> Eskom does not currently have a policy in place to deal with small-scale generation and thus will not give permission for small-scale generation. Certain municipalities are taking a more progressive approach which allows retailers to by-pass Eskom and use the municipal grid.



During 2016 Pick n Play has undertaken an assessment of their stores to determine the potential of each store for solar PV electricity generation. The objective behind this exercise was to determine which stores would fall within a solar PV suitability band based on criteria set up by the retailer. Based on this analysis, Pick n Play has decided to run two pilot projects for a minimum of two peak seasons, beginning at the end of 2016. Pick n Play is still in the process of finalising the two pilot sites and will be announcing this in November 2016. Pick n Play has previously run two pilot projects, but is of the opinion that the information gained from these initial pilots is now outdated, and was not sufficient to prioritise renewable energy in the business. Based on the outcomes of the store potential assessment and the findings of the pilot projects, Pick n Play will determine how they roll out renewable energy projects, but have indicated that they intend to follow a fairly slow pace.

The current pilot solar PV installations at Longmeadow distribution centre, Phillipi distribution centre and their Nicolway store in Johannesburg produced 553.51MWh during 2015.

### **Energy Efficiency**

Electricity use per square meter has been reduced by 32% since 2008 through the introduction of energy efficiency measures.

### **Planned Future Renewable Energy Investments**

It is currently unclear when the two pilot projects discussed above will be completed. These pilot projects will inform Pick n Play's investments going forward.

### **Current Targets**

Pick n Play has set a number of targets that they plan to achieve by 2020. These include: reducing carbon emissions intensity by 25%, measured against a 2008 baseline; reducing absolute emissions by

10%, measured against a 2015 baseline; and achieving overall energy efficiency improvements of 50%, measured against 2008 as a baseline. Despite publicly stating that they agree that renewable energy should be prioritised, Pick n Play does not plan to set targets for renewable energy in 2016 as they intend to first complete the two pilot projects discussed above. Pick n Play has indicated that they will only put renewable energy targets in place in the last half of 2017.

### **Energy Advocacy**

Pick n Play participated in the retailer round table hosted by Greenpeace Africa in July 2016. At this meeting all three retailers who attended agreed that a need exists for a holistic sector approach that includes financial mechanisms and regulatory frameworks to create an enabling framework for renewable energy going forward, and thus to lobby collectively for this. Pick n Play also took part in the initial conversation with the NBI as discussed under the Massmart section above, and significant steps forward have been taken. However, Pick n Play's lobbying ambition will be framed by how they engage with and carry out initiatives through the NBI, BUSA and CGCSA going forward.

Greenpeace believes that the NBI is one potential forum for the retailers to engage on energy issues through, but it is imperative that additional avenues through BUSA and CGCSA are also pursued.

### **Energy Transparency**

Pick n Play has voluntarily engaged with the CDP and submitted their 2016 report to the Climate Change programme. Pick n Play's information has been verified by a third party auditor and is available to the public through the CDP website.

Pick n Play has provided certain energy related information in their 2016 Sustainable Living Report, however more work needs to be done to ensure that the information provided is meaningful and allows customers to develop a better understanding of energy usage.





## **Current Renewable Energy Investments**

Spar invests in effective training programmes for their management and senior leaders, and in 2016 the programme was extended to include sustainability issues to ensure long-term thinking throughout the business. Spar has not made any investments in renewable energy to date.

## **Energy Efficiency**

The Spar group has put a number of energy efficiency initiatives in place including technology changes that focused on replacing old lights with energy saving light fittings and bulbs, motion detectors and timers, and reducing the consumption of air conditioning units through the installation of new technology. A programme focusing on identifying and implementing the most efficient refrigeration technologies within Spar facilities was also implemented. An additional programme focusing on replacing electric geysers with solar water heaters is currently underway.

## **Planned Future Renewable Energy Investments**

Spar has not undertaken the pilot project that was proposed in 2016 due to business priorities being focused elsewhere. Spar has however undertaken an analysis of the solar PV potential at their various distribution centres to inform planning going forward. There are currently no timeframes in place to guide this process, and no final recommendations as an outcome of the analysis.

## **Current Targets**

Spar has a five year environmental plan in place from 2013 to 2017 that aims for a 20% reduction in energy usage by 2017, with 2013 as the base year. As per the 2014 Integrated Report, Spar had achieved a 25% reduction as of September 2014, thus indicating that the five year plan shows a lack of ambition and more ambitious targets are required going forward. Spar has not updated their targets as described above and continues to show a lack of ambition in the renewable energy space.

## **Renewable Energy Advocacy**

Spar does not currently advocate directly on renewable energy policy and did not take the opportunity to participate in initial conversations with the NBI around their plans to engage with government and how retailers could be involved.

## **Energy Transparency**

Spar voluntarily submits information to the CDP and for the first time in 2016 this information was independently verified by an audit firm. This information is publicly available through the CDP website.

Spar has taken the important step to break down their climate change emissions information by facility in their CDP submission. It is important to break down this information in this way, as it indicates which areas of the business are the most energy intensive and should therefore be priority focus areas.

The 2015 Integrated Annual Report discusses key elements of Spar's CDP submission. This is a good start in providing the public with transparent energy information, but much more work should be done to educate the public on Spar's energy consumption, climate change impacts and how the targets that have been put in place could materially decrease the group's climate change impacts. Ultimately it is the responsibility of retailers to make energy information as accessible to their customers as possible.

### **Current Renewable Energy Investments**

Shoprite Holdings Ltd Integrated Report for 2015 stated that the group was undertaking the installation of solar PV panels on 60 buildings through strategic partnerships. The 2016 report states that Shoprite is in the process of installing solar PV systems on the roofs of their outlets. However, once again, the location, size and capacity of installations is not provided.

Information on the Shoprite website indicates that two solar PV plants were installed during 2016 at Checkers Kathu and Shoprite Kimberley. The Kimberley installation generates on average 990 kWh per day and the installation in Kathu generates 2 300 kWh. This information has been verified by the retailer.

### **Energy Efficiency**

The 2015 Integrated Report describes energy efficiency measures that were put in place through retrofitting 750,000 lamps and 85,000 control systems across Shoprite stores with more energy efficient equivalent lamps and control systems. The report did not supply information with regards to energy efficiency targets that have been set, targets that have been achieved to date or how effective the retrofitting has been. The 2016 report does not mention any of these initiatives and does not provide updates as to how these initiatives are progressing or their success rates.

### **Planned Future Renewable Energy Investments**

No information is currently publicly available.

### **Current Targets**

The 2016 Integrated Report describes the emission reduction targets that Shoprite has put in place for 2025, with 2014 as the base year, these targets are intensity targets as opposed to absolute targets and thus do not represent an aggressive commitment to emissions reduction. The report does not give any details as to the progress Shoprite has made with regards to these targets.

### **Energy Advocacy**

No information is currently publicly available.

### **Energy Transparency**

Shoprite has submitted information to the CDP for 2016; it is however currently unclear as to whether the retailer will elect to make this information publicly available. Shoprite continues to refuse to engage with Greenpeace Africa and has ignored multiple requests for meetings. Limited information is once again available in the Integrated Report for 2016 but no information is provided on how the retailer is progressing towards their targets.

# The Way Forward

Companies in South Africa urgently need to set ambitious renewable energy targets and procurement policies to send a clear signal to the market demanding renewable energy options in order to help kick-start the transition to a renewable energy future, which will have a knock-on effect to also help remove the barriers to household investments in rooftop solar PV.

## Recommendations

- Retailers must commit to an ambitious 100% renewable electricity target.
- Retailers must clearly define how they will reach this electricity target by developing short and long-term targets as part of a broader energy plan.
- Retailers must ensure that their renewable electricity commitment is directed in a way that will have a real impact, supporting the addition of new renewable energy onto the grid.
- Retailers must ensure energy transparency by providing comprehensive and detailed information on electricity consumption and greenhouse gas emissions, including location-specific information for all significant facilities, and ensure that this information is publicly available in an accessible format.
- Retailers must set a standardised and ambitious target for energy efficiency for their sector, and should participate in open-source sharing of energy efficiency design and equipment specification to enable further improvement in the sector.
- Retailers must become champions for renewable energy by actively lobbying government to remove the current barriers to renewable energy. It is essential that enabling and supportive policies are in place to achieve a 100% renewable electricity vision.



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Greenpeace has been working in Africa to end environmental destruction and fighting for the right of Africans to a healthy environment since the early 1990s. Our campaigns focus on climate change, halting the destruction of tropical forests, supporting ecological farming and preventing the degradation of marine ecosystems.

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