

# **SPRINGERBAAI Fire Risk Strategy**

**6 April 2018**

**Reviewed March 2021**

**THE HOA AND THEIR REPRESENTATIVES, IN TAKING THESE PRECAUTIONS AND IMPLEMENTING THESE CRITICAL FIRE RISK STRATEGIES, REACTION PLANS AND PROPOSALS IN GOOD FAITH AND DILIGENCE DO NOT ACCEPT ANY LIABILITY WHATSOEVER FOR ANY INJURY OR DEATH OF ANY PERSON OR THE LOSS OR DESTRUCTION OF OR DAMAGE TO ANY PROPERTY, WHETHER ARISING FROM FIRE, FIRE FIGHTING OR ANY OTHER CAUSE WHATSOEVER AND BY WHOMSOEVER CAUSED OR ARISING FROM NEGLIGENCE OR GROSS NEGLIGENCE BY THE HOA AND OR THEIR REPRESENTATIVES OR ANY EMPLOYEES. BY ENTERING THE SPRINGERBAAI PREMISES YOU OR YOUR HEIRS, EXECUTORS AND ADMINISTRATORS ALSO AGREE THAT YOU WILL INDEMNIFY THE HOA AND THEIR REPRESENTATIVES AND HOLD THEM HARMLESS AGAINST ANY CLAIM WHICH MAY BE MADE AS A RESULT OF SUCH LOSS, DAMAGE, DESTRUCTION, DEATH OR BODILY INJURY.**

Springerbaai Fire Risk Strategy – April 2018 – reviewed March 2021

## **Fire Risk Strategy of Springerbaai Eco-Estate**

### **1) Back ground**

- a) Springerbaai Eco-Estate is situated in the coastal belt of the southern cape where the predominant vegetation is
- Gouritz Dune Thicket (Gouritz Valley Bushveld) and Hartenbos Primary Dune communities (which were reported in 2007 as mostly fire resistant)
  - Springerbaai Renoster Thicket (Gouritz Valley Bushveld-Renoster transition) and Rooikrans insertions which are more prone to bush fire with a high FDI in 2007.

The bulk of the residential properties are situated in this vegetation.

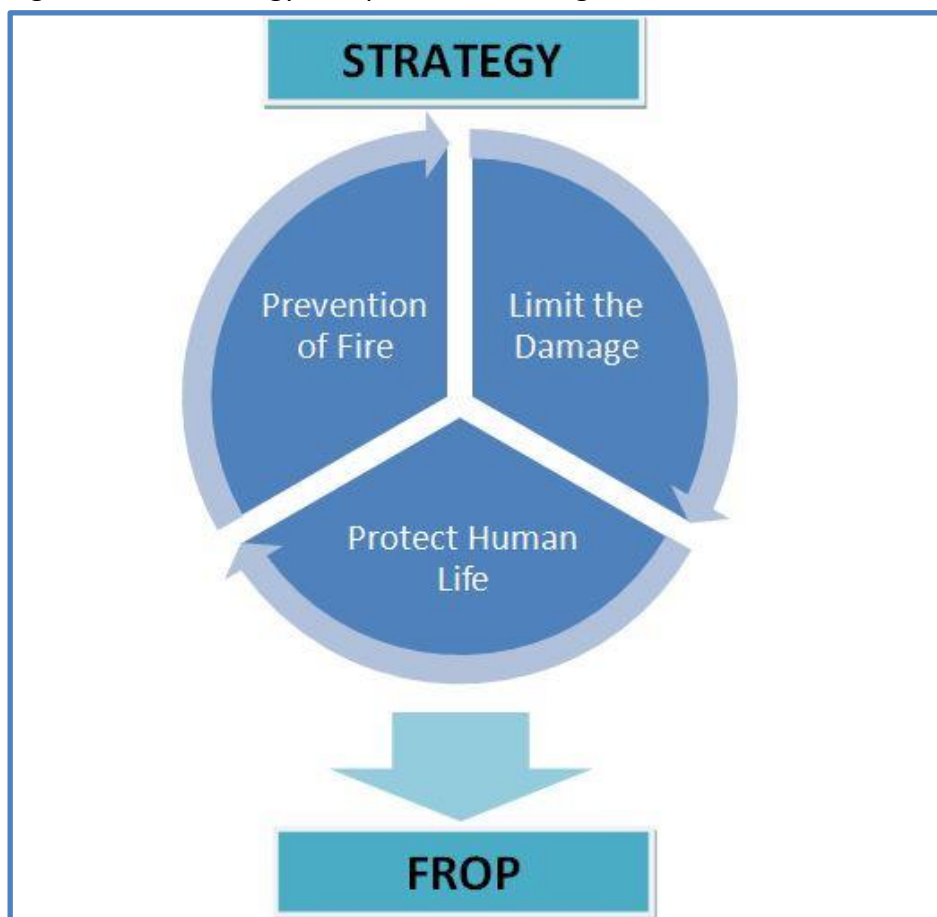
A major part of the estate is covered by grasslands for the game but is removed from the residential properties.

- b) It is also believed that fuel load has increased all over the thicket areas and that Rooikrans has increased in the Dune Thicket and certain other areas from 2007.
- c) The Southern Cape has recently been hit by major disastrous bush fires like in Knysna and Danabaai. The fires spread quickly with the strong winds.
- d) Southern Africa is also going through longer term climate change to a warmer and drier climate. The recent droughts in the Western and Southern Cape has certainly increased the fuel load of dry bush in natural environments.
- e) The above are all contributory factors that necessitated Springerbaai Trustees of 2017 having to review and reconsider the Fire Risk Strategy of the Estate. We initiated the process with the Fire and Natural Risk Analysis performed by Marsh. The second step is to review our strategy and form an action plan with the report and input from, the 2007 Fire Management Plan, various Trustees, Fire Dept and also homeowners. In certain cases experts still have to be consulted to decide on the best decisions for the Estate (eg. Water Infrastructure reviews).
- f) As a separate initiative the 2007 Fire Management Plan that includes ecological and environmental aspects should be reviewed due to changes in vegetation in certain areas during the last 10 years. (This relates to issues like where lack of veld fires can lead to the loss of species diversity and also to the accumulation of huge fuel load. The Springerbaai Renoster-Thicket (myrmecochorous species) is critically endangered vegetation and requires fire to regenerate.)

### **2) Purpose of this Fire Risk Strategy**

- a) The purpose of this document is to:
- consider findings of Reports and Springerbaai's unique circumstances in order to determine a high level approach towards fire risk at Springerbaai, and
  - to break the high level strategy down into various Objectives with a Detail Strategy and Action plan for each item.

- b) Other documents and procedures like the Fire Readiness Operational Plan (FROP) will follow from the Strategy.
- c) **The principle that will be followed is:**
  - i) The Estate will in general provide infrastructure and equipment to be able to fight and prevent fires, from its budget,
  - ii) The Estate will in general provide advice and suggestions for homeowners to protect their own properties but will not provide this from the estate budget,
  - iii) That the Estate will make certain regulations and procedures that might prevent a fire with regard to buildings, installations and conduct of owners/visitors that should be adhered to,
  - iv) Similarly, the estate will provide guidance and service providers for compliance reviews/audits of installations, estate but the homeowner will be responsible for reviews and compliance.
- d) The Springerbaai Fire Strategy is depicted in the diagram below:



### 3) High Level Strategy

- a) Our **first strategy** should always be **to prevent** any uncontrolled fire on the Springerbaai Estate. Our efforts and finances should be aimed at prevention of uncontrolled fires. The fires could start in following ways:
  - i) A bush fire in the vicinity that spreads from our neighbours or beach to us.

- ii) Any human actions that cause a fire on the estate for example staff, contractors or homeowners (incl. visitors, guests) not complying with procedures and regulations.
  - iii) Equipment or structures that were installed or changed and are not in compliance with current legislation or regulations like fire places, generators, electrical installations, hot works from contractors(welding) and solar systems, could cause fires.
  - iv) Other natural causes like lightning is deemed to be really low risk and very little can be done to prevent it.
- b) The **second strategy** should be **to limit the damage** of a fire including fighting of the fire. This would include:
- i) Immediate detection and communication
  - ii) Fire fighting to start in an agreed and trained fashion
  - iii) Property of owners and the estate to be protected
- c) A **third strategy** but most importantly, we need to avoid loss of human life.
- i) People to be evacuated if necessary to avoid loss of human life.

#### **4) Fire Prevention Objective**

##### **a) Fire spreading from neighbouring/adjacent regions to the Estate**

###### **i) Strategy FP1**

Prevent a fire from spreading to our estate by

- having sufficient fire breaks (5m/3m) along our boundary fences,
  - access to fences by vehicles to do water spraying before fire reaches us,
  - reduce the fuel load along the fences and firebreaks,
  - actively fight the fire with water trucks and fire department when it reaches the fences i.e. have infrastructure near fences to provide water, and
  - requesting neighbours to also do a 5m fire break with the help of the Fire Department
- ii) Action plan:
- (1) FP1-A: Immediately make all Firebreaks along the fences up to 5m wide (to within 5m from the beach boundary. ESTATE MANAGER to execute with Springerbaai and hired labour. Get necessary approvals if needed.
  - (2) FP1-B: ensure that 4x4 vehicles like fire trucks can drive along all fences. ESTATE MANAGER to execute as above.
  - (3) FP1-C: Remove all dead bush and rooikrans to within 30m from the firebreak. ESTATE MANAGER to execute with own labour.
  - (4) FP1-D: Prepare a plan how an encroaching fire from neighbouring properties will be fought (trucks, when aeroplanes used, where water from, communication, fire dept involvement) and train staff. ESTATE MANAGER

with Trustees and Fire Dept support, complete the plan (FROP). The Fire Dept will have input and Springerbaai would use all details/information to determine what we should change on our infrastructure and equipment.

(5) FP1-E: Write a Letter to neighbours to ask cooperation to build firebreaks up to 5m wide and ask Fire dept to request the same.

iii) Remaining unaddressed risks:

(1) Fire starting from the beach remains a risk and currently no real effective strategy in place due to the very thick bush and unfenced area. As a mitigating factor generally vegetation in the valleys are not that flammable.

## **b) Fire originating internally inside the Estate**

i) Strategy FP2

Review all procedures and regulations relating to installations/structures or actions of people living, working or visiting the Estate. Ensure suggestions of the Report are considered in the procedures and then re-issue the procedures to Homeowners, contractors and employees.

ii) Action plan

(1) FP2-A: Aesthetics Committee to review building regulations/guidelines to ensure suggestions regarding fire risks such as Electric installations/wiring, Generator installations, Fuel supply storage, Fire place, Gas installations/connections and Solar installations have been taken into account and update relevant regulations.

(2) FP2-B: The Estate to **propose that owners** conduct a compliance review of their houses, by approved contractors for the following aspects:

- Electric wiring and installations
- Solar installations and battery systems
- gas installations and related gas piping
- generator installations and fuel storage

The Estate to select and propose the scope of each contractor and after the homeowner has completed the proposed work to obtain compliance certificates. Homeowners to arrange and pay for investigations & remedial work if required.

(3) FP2-C: Procedures regarding use of fireplaces, hot ash handling, contractors hot works, screens or demarcation, supervision, storage of materials at gatehouse, Construction camp and general precautions to be reviewed and re-issued to Homeowners and relevant Contractors, etc. Alternatively provide suggestions. Consider the provision of standard ash trays, diesel containers, etc., as approved items sold by estate to owners.

## **5) Limitation of the impact Objective**

### **a) Fire fighting and reducing the spread of a fire**

#### **i) Strategy LI1**

Ensure a proper action plan for fighting any fires around the estate, including training and fire drills to ensure readiness. Ensure sufficiency of water supply, adequacy of water trucks and communication plans and procedures.

#### **ii) Action plan**

- (1) LI1-A: Review or draw up a fire fighting plan for the various areas and structures on the estate with input from Fire Department and consider the right equipment, resources and water supply required. Part of the FROP.
- (2) LI1-B: Propose additional equipment required for effective fire fighting or where equipment can be rented. This will include consideration of water trucks, trailers, pumps on vehicles, etc.
- (3) LI1-C: Determine the exact requirement of water supply and pressure required for effective fire fighting around the estate (in zones) and propose the type of equipment and infrastructure needed. (Consider the water supply system, reservoir, pump, tanks, generator).
- (4) LI1-D: Consider also access to fires, arrangements with external parties, cost, additional fire fighting mechanisms – plane, helicopter and insurance policies to cover cost, damage of fire fighting actions.
- (5) LI1-E: Budget, procure and install the relevant items.

### **b) Protecting property of homeowners and property/infrastructure of the Estate**

#### **i) Strategy LI2**

Review requirements for effective protection of building structures against fire and list instructions & procedures to be changed (including sprinkler systems, protective coating on roofs, hydrants and hosepipes, extinguishers, bush clearing). Propose that these items are to be paid and actioned by homeowners. The principle to be followed is – homeowners will decide themselves how to protect their own property against a fire and the estate will give advice. The estate will inform homeowners by way of a letter of their plans, suggestions, etc.

#### **ii) Action plan**

- (1) LI2-A: From review of the report propose what action/steps are to be taken in terms of
  - compulsory steps to be taken and paid by the Estate (provision of water, hydrants, service extinguishers, etc),

- proposals for homeowners to implement (sprinkler systems, protective coating, buy extinguishers),
  - procedures/instructions to be changed and informed by Management
- (2) LI2-B: Investigate what clearing distance (1m to 5m) of bush around structures should be maintained and obtain necessary environmental permission if required. Propose findings covering the following items:
- Clearance of bush (fuel load) around houses and/or replace by less flammable vegetation. Also pruning of bush.
  - Clearance around Estate structures (buildings, reservoir, Construction camp)
  - Clearance of bush along boardwalks, viewpoints, bird hides, beach gates and sewerage/solar points.
- Immediately action clearance if allowed and request permission if not allowed. Inform homeowners what they may do.
- (3) LI2-C: Immediately arrange for dry bush (fuel load) and rooi krans to be removed within 10m of all properties and infrastructure. Remove dead bush around houses.
- (4) Consider additional underground or above ground Water Tanks at houses, if possible, collection of water from thatched roofs and storage of water so that it can be used when fighting a fire particularly if other water supplies are under threat.

**c) Avoiding the loss of human life**

i) Strategy LI3

To take all necessary steps in terms of plans, procedures, communication systems, evacuation plans in order to ensure that people are informed & orderly evacuated in event of an uncontrolled fire.

ii) Action plan

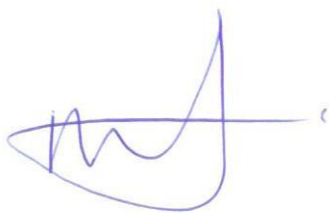
- (1) LI3-A: Establish a communication system (or review) and determine a Zone based evacuation plan depending on the area of the fire considering boardwalks, paths, roads, etc. To provide the plan and system.
- (2) Inform homeowners, contractors & employees of the plan and distribute into all structures.
- (3) LI3-B: ESTATE MANAGER to arrange a fire drill/mock evacuation during peak seasons.
- (4) LI3-C: Consider what needs to be put in place to effectively communicate and evacuate in terms of information (tell no's), IT, sufficient paths, etc.

**6) Proposals from action steps to be approved by the Trustees.**

- a) Proposals arising from the strategy would be considered by the Trustees and approved

- i) Some proposals will immediately be executed due to low cost and general consensus about the activity
- ii) Other proposals will require further research or investigation and might also involve bigger investments
- iii) Input and comments from Homeowners will be considered where possible and reasonable. Pls note, sometimes Homeowners have opposing views about an issue and the Trustees have to come to a conclusion based on their best knowledge.

On behalf of Trustees:

A handwritten signature in blue ink, consisting of a series of loops and a long horizontal stroke extending to the right.

Approved: 7 April 2018

**THE HOA AND THEIR REPRESENTATIVES, IN TAKING THESE PRECAUTIONS AND IMPLEMENTING THESE CRITICAL FIRE RISK STRATEGIES, REACTION PLANS AND PROPOSALS IN GOOD FAITH AND DILIGENCE DO NOT ACCEPT ANY LIABILITY WHATSOEVER FOR ANY INJURY OR DEATH OF ANY PERSON OR THE LOSS OR DESTRUCTION OF OR DAMAGE TO ANY PROPERTY, WHETHER ARISING FROM FIRE, FIRE FIGHTING OR ANY OTHER CAUSE WHATSOEVER AND BY WHOMSOEVER CAUSED OR ARISING FROM NEGLIGENCE OR GROSS NEGLIGENCE BY THE HOA AND OR THEIR REPRESENTATIVES OR ANY EMPLOYEES. BY ENTERING THE SPRINGERBAAI PREMISES YOU OR YOUR HEIRS, EXECUTORS AND ADMINISTRATORS ALSO AGREE THAT YOU WILL INDEMNIFY THE HOA AND THEIR REPRESENTATIVES AND HOLD THEM HARMLESS AGAINST ANY CLAIM WHICH MAY BE MADE AS A RESULT OF SUCH LOSS, DAMAGE, DESTRUCTION, DEATH OR BODILY INJURY.**