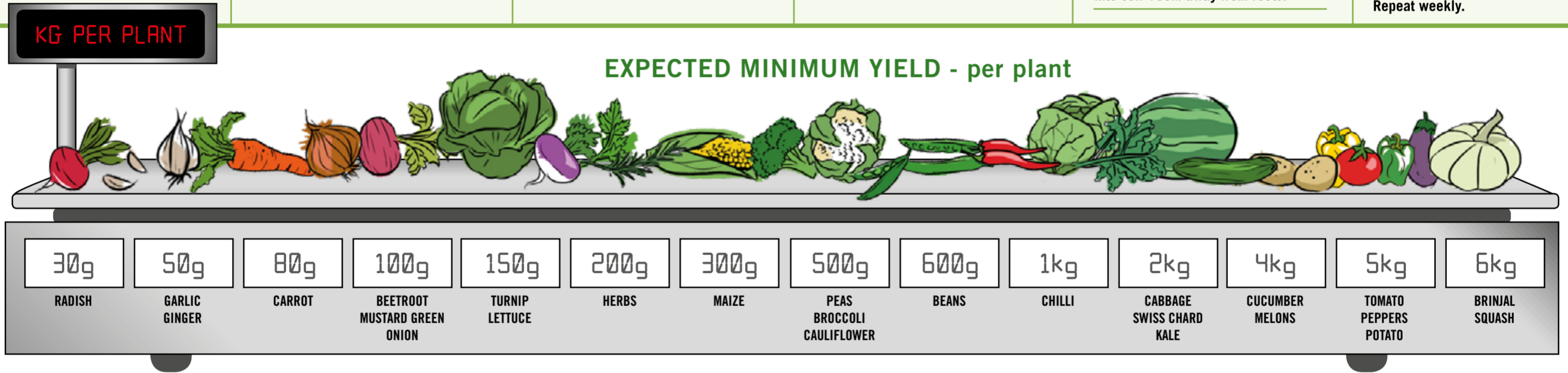


PRODUCTION PLANNING

STRATEGY	FRUITING CROPS. ONGOING PRODUCTION.	CONTINUOUS PLANTING. PLANT ONE, REAP ONE (1 IN - 1 OUT).	FILLER CROPS AT SEASON CHANGE. COMPANION PLANTS. CUT AND COME AGAIN.	UNDERGROUND CROPS. ANNUAL - ONE HARVEST. UTILISE LANDS DURING COLD SEASON.	SEASON SPECIFIC. BIG AREA OF LAND REQUIRED. DRYLAND CULTIVATION.																																																						
VARIETALS and PLANTING DENSITY SPACING of PLANTS PER m ²	<table border="1"> <tr><td>TOMATO</td><td>4 per m²</td></tr> <tr><td>PEPPERS: Green/Yellow/Red</td><td>5 per m²</td></tr> <tr><td>BRINJAL (Eggplant)</td><td>4 per m²</td></tr> <tr><td>CUCUMBER</td><td>6 per m²</td></tr> <tr><td>CHILLI</td><td>6 per m²</td></tr> </table>	TOMATO	4 per m ²	PEPPERS: Green/Yellow/Red	5 per m ²	BRINJAL (Eggplant)	4 per m ²	CUCUMBER	6 per m ²	CHILLI	6 per m ²	<table border="1"> <tr><td>BEETROOT</td><td>33 per m²</td></tr> <tr><td>RADISH</td><td>60 per m²</td></tr> <tr><td>CARROT</td><td>60 per m²</td></tr> <tr><td>CABBAGE</td><td>5 per m²</td></tr> <tr><td>TURNIP</td><td>33 per m²</td></tr> <tr><td>BROCCOLI</td><td>9 per m²</td></tr> <tr><td>CAULIFLOWER</td><td>9 per m²</td></tr> </table>	BEETROOT	33 per m ²	RADISH	60 per m ²	CARROT	60 per m ²	CABBAGE	5 per m ²	TURNIP	33 per m ²	BROCCOLI	9 per m ²	CAULIFLOWER	9 per m ²	<table border="1"> <tr><td>SWISS CHARD</td><td>20 per m²</td></tr> <tr><td>MUSTARD</td><td></td></tr> <tr><td>GREENS</td><td>20 per m²</td></tr> <tr><td>KALE</td><td>20 per m²</td></tr> <tr><td>LETTUCE</td><td>15 to 30 per m²</td></tr> <tr><td>HERBS</td><td>depends on variety and whether it is an annual or perennial.</td></tr> </table>	SWISS CHARD	20 per m ²	MUSTARD		GREENS	20 per m ²	KALE	20 per m ²	LETTUCE	15 to 30 per m ²	HERBS	depends on variety and whether it is an annual or perennial.	<table border="1"> <tr><td>ONION</td><td>60 per m²</td></tr> <tr><td>POTATO*</td><td>5 per m²</td></tr> <tr><td>GARLIC*</td><td>50 per m²</td></tr> <tr><td>GINGER</td><td>12 per m²</td></tr> </table>	ONION	60 per m ²	POTATO*	5 per m ²	GARLIC*	50 per m ²	GINGER	12 per m ²	<table border="1"> <tr><td>MAIZE</td><td>9 per m²</td></tr> <tr><td>BEANS</td><td>12 per m²</td></tr> <tr><td>PEAS</td><td>12 per m²</td></tr> <tr><td>SQUASH</td><td>0,5 per m²</td></tr> <tr><td>MELONS</td><td>0,5 per m²</td></tr> </table>	MAIZE	9 per m ²	BEANS	12 per m ²	PEAS	12 per m ²	SQUASH	0,5 per m ²	MELONS	0,5 per m ²
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GROWING PERIOD: DAYS TO HARVEST	<table border="1"> <tr><td>Tomato</td><td>80 - 150 days**</td></tr> <tr><td>Peppers</td><td>75 - 150 days**</td></tr> <tr><td>Brinjals</td><td>80 - 90 days**</td></tr> <tr><td>Cucumber</td><td>70 - 80 days**</td></tr> <tr><td>Chilli</td><td>85 - 90 days**</td></tr> </table> <p>** Harvesting on an ongoing basis will encourage the plant to continue producing.</p>	Tomato	80 - 150 days**	Peppers	75 - 150 days**	Brinjals	80 - 90 days**	Cucumber	70 - 80 days**	Chilli	85 - 90 days**	<table border="1"> <tr><td>Beetroot</td><td>80 - 110 days</td></tr> <tr><td>Radish</td><td>20 - 35 days</td></tr> <tr><td>Carrot</td><td>90 - 110 days</td></tr> <tr><td>Cabbage</td><td>90 - 110 days</td></tr> <tr><td>Turnip</td><td>50 - 70 days</td></tr> <tr><td>Broccoli</td><td>85 - 90 days</td></tr> <tr><td>Cauliflower</td><td>85 - 90 days</td></tr> </table>	Beetroot	80 - 110 days	Radish	20 - 35 days	Carrot	90 - 110 days	Cabbage	90 - 110 days	Turnip	50 - 70 days	Broccoli	85 - 90 days	Cauliflower	85 - 90 days	<table border="1"> <tr><td>Swiss Chard</td><td>45 - 120 days</td></tr> <tr><td>Mustard greens</td><td>40 - 65 days</td></tr> <tr><td>Kale</td><td>55 - 120 days</td></tr> <tr><td>Lettuce</td><td>50 - 60 days</td></tr> <tr><td>Herbs</td><td>60 - 180 days</td></tr> </table>	Swiss Chard	45 - 120 days	Mustard greens	40 - 65 days	Kale	55 - 120 days	Lettuce	50 - 60 days	Herbs	60 - 180 days	<table border="1"> <tr><td>Onion</td><td>150 - 200 days</td></tr> <tr><td>Potato</td><td>100 - 120 days</td></tr> <tr><td>Garlic</td><td>140 - 170 days</td></tr> <tr><td>Ginger</td><td>175 - 220 days</td></tr> </table>	Onion	150 - 200 days	Potato	100 - 120 days	Garlic	140 - 170 days	Ginger	175 - 220 days	<table border="1"> <tr><td>Maize</td><td>90 - 120 days</td></tr> <tr><td>Beans, Runner</td><td>55 - 60 days**</td></tr> <tr><td>Peas</td><td>100 - 120 days</td></tr> <tr><td>Squash</td><td>90 - 100 days</td></tr> <tr><td>Melons</td><td>100 - 120 days</td></tr> </table> <p>** Harvesting on an ongoing basis will encourage the plant to continue producing.</p>	Maize	90 - 120 days	Beans, Runner	55 - 60 days**	Peas	100 - 120 days	Squash	90 - 100 days	Melons	100 - 120 days		
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DEVELOP AN INTEGRATED PREVENTATIVE PEST MANAGEMENT (IPPM) PROGRAMME FOR MONTHLY MAINTENANCE AND PREVENTION, INCLUDING CROP ROTATION, COMPANION PLANTING, PROPER SPACING, SOIL FERTILITY AND REGULAR MONITORING.

FERTILISER / SOIL AMENDMENTS	STEP 1, STEP 2, STEP 3, STEP 4, STEP 5, STEP 6	STEP 1, STEP 2, STEP 3, STEP 4	STEP 1, STEP 2, STEP 3, STEP 4, STEP 5	STEP 1, STEP 2, STEP 3, STEP 4	STEP 1, STEP 2, STEP 3, STEP 4, STEP 6
<p>STEP 1 CROP ROTATION</p> <p>Plant in rotation:</p> <p>Heavy Feeders</p> <p>Light Feeders</p> <p>Legumes or cover crops;</p> <p>Repeat.</p>	<p>STEP 2 BED PREP</p> <p>At bed preparation stage:</p> <p>ADD</p> <p>Bone meal</p> <p>Compost</p> <p>Diatomaceous Earth (DE)</p> <p>Cured (dried) Kraal manure</p>	<p>STEP 3 PRE-PLANTING</p> <p>Just before planting (seed or seedlings):</p> <p>ADD</p> <p>2:3:2 (N:P:K) to soil</p> <p>OR</p> <p>Cured (dried) Chicken manure.</p>	<p>STEP 4 TOP DRESS</p> <p>6 weeks after planting seedlings or 12 weeks after planting seed:</p> <p>TOP DRESS with 6:3:4 (N:P:K) and COVER with mulch.</p>	<p>STEP 5 FERTILISER</p> <p>Repeat every 2 weeks after Step 4:</p> <p>Apply an organic, liquid 4:1:1 (N:P:K) fertiliser as a foliar spray</p> <p>OR</p> <p>1 teaspoon dried chicken manure into soil 10cm away from roots.</p>	<p>STEP 6 FERTILISE DURING FLOWERING AND FRUITING STAGE</p> <p>TOP DRESS with 3:1:5 (N:P:K) and COVER with mulch</p> <p>OR</p> <p>1 teaspoon of dried chicken manure into soil 10cm away from root. Repeat weekly.</p>



PLANTING SEASONS

	JAN	FEB	MARCH	APRIL	MAY	JUNE	JULY	AUG	SEPT	OCT	NOV	DEC	
FROST AREAS	Carrots, Beetroot							Carrots, Beetroot					
	Kale							Kale					
	Spring Onion								Spring Onion				
	Runner Bean							Runner Bean					
	Sweet Peppers					Onion				Sweet Peppers			
		Cabbage, Broccoli, Cauliflower								Chilli			
	Mustard Spinach									Mustard Spinach			
	Swiss Chard								Swiss Chard				
				Peas						Squash, Pumpkin, Melon			
	Tomato, Brinjal, Herbs			Turnip						Cucumber			
			Garlic							Tomato, Brinjal, Herbs			
	Potato								Ginger				
Radish								Potato					

	JAN	FEB	MARCH	APRIL	MAY	JUNE	JULY	AUG	SEPT	OCT	NOV	DEC	
FROST-FREE AREAS	Carrots, Sweet Peppers, Swiss Chard							Carrots, Sweet Peppers, Swiss Chard					
	Kale, Beetroot, Potato							Kale, Beetroot, Potato					
		Cabbage, Broccoli, Cauliflower							Maize				
	Spring Onion				Onion				Spring Onion				
	Runner Bean, Chilli		Garlic						Ginger				
	Herbs				Peas					Runner Bean, Chilli			
										Squash, Pumpkin, Melon, Cucumber			
	Mustard Spinach, Radish				Lettuce					Herbs			
	Tomato									Lettuce			
	Brinjal			Turnip						Tomato			
										Brinjal			



African Climate Reality Project

www.climatereality.africa
www.trees.org.za