



GRAMIN KRISHI MAUSAM SEWA
ICAR RESEARCH COMPLEX FOR NEH REGION
 Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Lunglei

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/English

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	10	10	11	11	12
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	99	99	99	99	98
Min RH (%)	31	29	34	37	53
Wind Speed (Kmph)	4	3	4	2	3
*Wind Direction	E	E	E	E	S-E

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
 Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- June 1-30, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 384.87mm (430.2mm)	Champhai- 105.48mm (359.89mm)	Saiha- 307.40 mm (507.7mm)	Kolasib- 236.00mm (428.1mm)
Lawngtlai-291.20mm (453.1mm)	Lunglei-326.00mm (465.14mm)	Mamit-204.87mm (442.80mm)	Serchhip-411.72mm (259.62mm)

Weather summary of the past three days

Maximum Tem. (°C): 22-25°C
Minimum Tem. (°C): 7-12°C
Maximum RH (%):76-88%
Minimum RH (%):35-52%
Wind Direction: Southeasterly
Cloud cover: Mainly cloudy
Wind Speed: 2km/hr

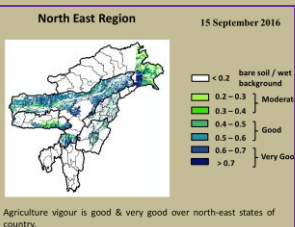
Rainfall: 00.0 mm

Weather forecast valid from 14th December, 2016 To 18th December, 2016.

There is no chance of rainfall during the next 5 days. The maximum and minimum temperatures for the next 5 days may range for 26-27°C and 10-12°C. Maximum relative humidity is expected in the range of 98-99% and minimum may from 29-53%. Wind direction would be easterly to southeasterly with the wind speed of 2-4 km per hour. Clear sky will prevail during the next five days.

Weekly cumulative rainfall: 00.0 mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions

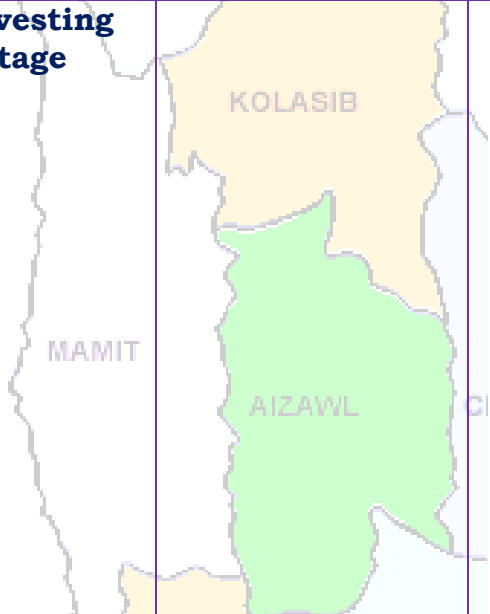
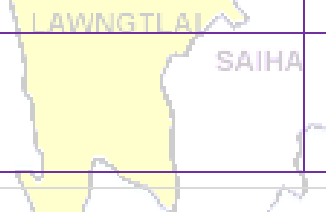


GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Main Crop/ Animal /Fisheries	Stage	Cultural practices/ Pest/ Diseases	Agricultural / Horticultural/ animal husbandry advisories
Khasi Mandarin and acid lime	Harvesting stage		- Orange is picked when colour turn to dark green to pale yellow. - Mandarins and sweet oranges normally take 240-280 days to arrive at maturity. - Mature fruits at colour break stage are picked up in 2 - 3 intervals of 10-15 days. - Limes and lemons take 150-160 days for maturity. - There may be 2 or 3 crops in a year in limes and lemons. - The cold storage conditions for long term storage for different citrus fruits are available. - Oranges may be packed in well ventilated CFB boxes - 30 cm x 30 cm x 30 cm.
Oil plam	Harvesting stage		- Harvest only ripe fruit bunches and collect all loose fruit using high quality harvesting equipment. - The oilplam will be ready for harvest ready for harvesting in 2.5 to 3 years after the plantation in the main field. - Harvesting can be done when the fruit on plam turns into yellowish to orange colour. - While harvesting a stalk length of 5 cm alone should be left. Harvesting should be done at 10-12 days interval. - In young plantations, we get more bunches with less bunch weight and in adult plantations the bunch weight is more but the bunch number is less.
Colocasia	Harvesting stage		- Leaves have started turning yellow and some of them have fallen off, signaling the time for harvesting the corms. - Crop will be ready for harvest in 6-8



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	months after planting. - One month prior to harvest, all the suckers may be wrapped around the base of the mother plant and covered with soil by earthing up, for arresting further vegetative growth and sprouting of tubers. - After this, irrigation has to be withheld to hasten maturity. - Harvesting is done by carefully uprooting the plants and the mother corms and cormels are separated.
Tomato	Flowering to fruit formation stage	AIZAWL	- Prevailing weather may conducive for blight in Tomato. - Cloudy and humid weather is most favorable for the disease. - To manage the blight in tomato apply Ridomil or Indofil or Mancozeb @ 2 gm per liter of water.
		Bacterial wilt	- Uproot all infected plant and burn it. - This disease can be minimized by practicing crop rotation. - Soil dranching with Bordeaux mixture (1:1:100) after one month of planting is effective method to manage this disease.
		Fruit fly	In large gardens apply carbaryl 0.2 per cent or malathion 0.15 per cent suspension containing sugar or jeggery at 10 g/l at fortnightly intervals at flowering and fruit initiation.
Early Cole crop	Black spot disease	LAWNGTLAI	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Prevailing weather may conducive for black spot disease in Cole Crops. - To manage the attack in leafy vegetables and Cole crops,



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			Mancozeb @ 2gm per liter of water may be sprayed.
		Cutworm KOLASIB	- Prevaling weather is conducive for the attack of cut worm which hide during day time in cracks of the soil and become active at dusk, feed on leave and cut the tender stem. - Apply cypermethrin or carbaryl 2 ml/lt of water or Tricel 1 ml/lt of water in evening every 10 days interval.
Capsicum	Nursery stage	Poly house MAMIT	- Raised bed, nursery bed solarisation. - Bed should be 1m width and conventional length. - Application of FYM (1.5-2.0 kg/ m²) - Line sowing of seeds (7-10cm)
		AIZAWL	- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
Carrot and radish	Sowing stage	SERCHHIP LUNGLEI LAWNGTLAI SAIHA	- Carrots and radish are sown in raised beds having dimension of 1 metre breadth, any convenient length and raised from 15 to 30 cms. - In order to have an evenly sown crop the seeds are mixed with dry/ loose soil. - In this method the seeds are sown in lines with the help of a marker at a distance of 6 cms apart. - The seeds are then covered with loose and friable soil of about 2-4 cms again depending upon the rainfall and season. 90: 250: 130 Kg NPK will apply throughout the cropping season where whole quantity of Single Super Phosphate, Muriate of Potash and half the quantity of Urea is to be given as basal dose at the time of final preparation of the land.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Potato	Sowing	KOLASIB	- Prepare the land for potato cultivation without any further delay. - This may help to avoid some bacterial infection at growing stage. - Land may be ploughed thoroughly for proper tillage. - If land is prepared good quality of seeds may be collected for planting. - Cultivation from TPS is also found profitable. - Seed must be treated before sowing.
Onion	Nursery stage	MAMIT AIZAWL CHAMPHAI	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Spray Pendimethalin @ 3.5ml/lt of water in nursery which will give effective control of weed.
		SERCHHIP	- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
Brussels sprout	Nursery stage	LUNGLEI	- Raised bed, nursery bed solarisation. - Bed should be 1m width and conventional length. - Application of FYM (1.5-2.0 kg/ m²) - Line sowing of seeds (7-10cm)
			- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
French bean	Sowing stage	LAWNGTLAI SAIHA	- Variable, healthy, well mature and pure seeds should be sown. - Optimum spacing for pole type 60 cm X 30 cm. - Before sowing seed should be treated with Rhizobium vermicompost@10



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Ginger and turmeric	Maturity stage	KOLASIB	t/ha. - Field must be inspected daily for disease appearance. - While inspecting, the healthy plants/plots must be marked and kept for planting in the next season. - Marking has to be done properly otherwise when plant matures and gets dried up, it will be very difficult to find out the marked plots.
Zero tillage pea and lentil cultivation in rice fellow	Sowing stage	MAMIT AIZAWL CHAMPA SERCHHIP	- After harvesting of rice, pea and lentil will sow under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the rabi crops pea and lentil. - Pea and lentil will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 30 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of lentil seeds and covered the seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Pig	All stages	Swine flu LUNGLEI LAWNGTLAI SAIHA	- Swine flu may occur in pig at all stages. It is a viral flu and highly contagious. Clinical signs include high fever, skin lesions, convulsions, constipation followed by diarrhea and vomiting, less appetite. - In pregnant animals abortion or still birth or weak litters may also happen. Once the symptoms is noticed, immediately informed the nearby veterinary Doctor. Maintain hygiene of the shed with application of Potassium Per Manganite (1-2 gm per in 15 litter of water) and lime both inside and outside of



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Porcine Reproductive Respiratory Syndrome (PRRS).	1. Culling of positive pigs or piglets.
	Adult stage	Swine fever.	2. Vaccination of pigs with SF vaccines at 2 months and yearly interval/6 month interval
Cattle	All age group		Due to prolong dry spell there is a shortage of green grass in the field. For balanced diet and nutrition to your cattle, provide urea molasses treated paddy straw.
	All age group	Foot and Mouth Disease (FMD)	FMD vaccine at 16 week and repeat every 6 month.
	Young stage	Black Quarter (BQ)	- Black Quarter Vaccine (BQV). ❖ Primary vaccination 6 month or above ❖ Revaccination annually
Poultry	Litter management		- Good management and sanitation are the best ways to avoid infectious disease in poultry. - Provide ample quantity of clean drinking water. - Avoid feeding of mouldy feed. Don't make sudden changes in feed
	Preventive measures	0-3rd week	Ranikhet Disease- F1 vaccine at (1-6) days of birth and R₂B vaccine for adult birds. - B complex with antibodies
		4th weeks	Coccidiosis- Amprolium or coccidiostat



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratantplantpatho@gmail.com
Dr. L. H. Puii	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr. M. Thoithoi Devi	:	Scientist (Agronomy)	thoiagri@gmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Name of the KVK	Programme Coordinator Name and Designation	KVK Email Id	Phone no/ Mobile no
KVK Lunglei	Dr. Lalmuanzovi Head & Sr. Scientist	kvkhnahthial@gmail.com	9862803750 9436154614
KVK, Kolasib	Mr. Lalrosamga Khiangte Head & Sr. Scientist	kvkkolasib@gmail.com	9436152440
KVK, Serchhip	Mr. K. Laltlanmawia Head & Sr. Scientist	kvkserchhip@gmail.com	9436146115 9615389293
KVK, Champhai	Mrs. Lalrinawmi Renthlei Head & Sr. Scientist	kvkchawzawl@gmail.com	9436159788
KVK, Lawngtlai	Dr. Michel Lallawmkimi Head & Sr. Scientist	kvklawntlai@gmail.com	9436155858
KVK, Saiha	Dr. Vanlalhruaia Hnampe Head & Sr. Scientist	kvksaiha@gmail.com	8974656509
KVK, Mamit	Dr. Samuel Lalliansanga Head & Sr. Scientist	kvkmamit@gmail.com	9436147625
KVK, Aizawl	Dr. K. P. Chaudhary Head & Sr. Scientist	Kpchy@rediffmail.com kvkaizawl@rediffmail.com	9436351669



GRAMIN KRISHI MAUSAM SEWA
ICAR RESEARCH COMPLEX FOR NEH REGION
 Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Lunglei

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/Mizo

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	10	10	11	11	12
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	99	99	99	99	98
Min RH (%)	31	29	34	37	53
Wind Speed (Kmph)	4	3	4	2	3
*Wind Direction	E	E	E	E	S-E

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
 Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- May 1-31, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 383.68mm (341.8mm)	Champhai- 239.49mm (250.30mm)	Saiha- 109.52 mm (87.2mm)	Kolasib- 352.38mm (380.9mm)
Lawngtlai-321.51mm (285.5mm)	Lunglei-344.00mm (186.21mm)	Mamit-449.48mm (442.80mm)	Serchhip-411.72mm (259.63mm)

**Ni thum kalta sik leh sa
dinhmun tlangpui**

**14th December– 18th December, 2016
chhunga sik leh sa dinhmun tur tlangpui**

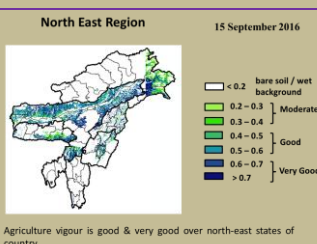
Maximum Tem. (°C): 22-25°C
Minimum Tem. (°C): 7-12°C
Maximum RH (%): 76-88%
Minimum RH (%): 35-52%
Wind Direction: Southeasterly
Cloud cover: Mainly cloudy
Wind Speed: 2km/hr

Tun ni 5 chhung lo awm turah hian ruahtui tla miahlo tura beisei a ni. Khua a lum lai berin 26-27°C a ni ang a. A vawh lai ber in 10-12°C ni tura beisei a ni. RH san lai berin 98-99% leh a hniam lai berin 29-53% ni tur a rin niin. Thli hi darkar khatah 2-4 km vela chakin chhaklam awi zawngin a tleh rin a ni. A tlangpuiin tun ni nga chhung hian khawthiang tak hmuh beisei a ni.

Rainfall: 00.0 mm

Weekly cumulative rainfall: 00.0mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Thlai/ ran /sangha	Spat zawng	Hmalakna tur/ rannung leh natna hrik awm thei te	Agricultural/Horticultural/ animal husbandry atana thurawn
Khasi Mandarin leh acid lime	Seng (Harvesting) hun		- Serthlum rah chu a hringduk atanga rawng eng dala arawn inthlak hunah lawh tur a ni. - Mandarins leh sweet oranges te hian an puitlin nan ni 240-280 vel an mamawh. - A rah puitling tawhin a hmin rawng a rawn chhuah tan hunah lawh tur a ni a, ni 10-15 inkar danah wawi 2- 3 lawh tur a ni - Limes leh lemons hian puitlin nan ni 150-160 an mamawh. - Limes leh lemons te hi kum khatah wawi 2 emaw wawi 3 emaw an rah thei. - Rei tak dahthat theihna tur vur bawm (cold storage)changtlung tak ser rah chi hrang hrang tan a awm hrang vek bawk a ni. - Ser rah te chu boruak thianghlim luh theihna tur bawm (CFB Box) 30 cm x 30cm x 30 cm azau ah pack fel tur a ni.
		Ser rah bawmtu rannung thlawkthei (Fruitfly)	Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
Sapthei	Seng (Harvesting) hun		- A kung phun a nih atanga thla sawm hnu ah rah a pe chhuak tan a, chuan thla 16-18 a nih thlengin a rah chhunzawm ta thin a ni. - Rah hun bik hi tum hnih (2) a nei a chu chu August -



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			December leh March- May ah te an ni. - A rah hmin nan ni 80-85 vel a mamawh thin. - A rah rawn senduk (purple) toh chu a kuang tlem a zawng nen lawh tel tur a ni. - A rah seng tawh ho chu a pian hmang leh rihna te a tlakhniam hma in a rang lam a hralh zawh vat tur a ni. - A ro hnu in a kor te chu zur angin lang mahse a chhung lam erawh ni engemaw chen chu ala tha vek thung ang. - A kung a natna nei te chu lakkhawm a hal ral vek tur. - Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
		Sapthei rah bawmtu rannung thlawkthei (Fruitfly)	
Balhla	Seng (Harvesting) hun		- A hring atanga a eng a a inthlak hunah . - A thlar a balhla ho hmun li a then a hmun thum an pum that a a bak zawngin kil anla neih lain. - Balhla hi anla puam a an hrin that lai mahse an hmin hma si in. - Balhla te an sin lai leh rawng hring duk anla nih lai chuan sengloh tur a ni. - Rawng eng an nih tawh chuan seng nan a tlai tawh tihna a ni.
		Balhla zung eichhetu rannung (Banana Rhizome)	Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		weevil)	tui chu rannung tui 50 per cent a keu hun velah kah tur a ni (July kar hmasa ber a ni tlangpui).
		Banana panama wilt	✚ Natna kai lo chauh phun tur. Natna kai ho chu a zung nen kara paih tur. Farm-a hmanraw hrang hrangte natna hrik kai lo tura tihfai thin bawk tur a ni.
		Banana beetle	✚ A bul vela hnim to tihfai tur ✚ A no rawn chawr thar mamawh loh te paih tur ✚ Alphamethrin 0.01 per cent hman tur
Oil palm	A rah insiam tan hunlai	AIZAWL CHAMPA SERCHHIP	✚ A nu leh pa par hma lutuk te thenfai tur ✚ Heihian a kung a ti thag tha in zung a kaih ngheh tir bik thin a ni. Phun atanga thla 14-18 velah an par tlangpui ✚ A par nu leh pa hi a kung in vui a rawn chhuah tan tirh ah pawh phawi vat tur anni. ✚ Kut in emaw a pawhphawina hmanrua DOPR in ansiam hmangin awlsam takin a tih theih a ni. ✚ Hetianga a par nu leh pa lak hi kum hnih leh chanve atanga kum thum annih vel thlengin a tih zawm theih a ni.
		LUNGLEI LAWNGTLAI SAIHA	✚ Thli leh rannung ten inthlahchhawanna kawngah an pui thin a, amaherawhchu thli hmanga inthlahchhawanna erawh hichuan a thawh hlawklo. ✚ Inthlahchhawn nan a rannung tangkai tak <i>Elaeidobius kamerunicus</i> hian a inthlahchhawanna ah leh a rah tur insiam kawngah a pui nasa hle a ni. ✚ Phun anih atanga kum hnih leh chanve hnu ah he rannung hi chhuah a tha a, kum thum hnu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			a a kung in a that puiloh anih chuan he rannung hi chhuah vek tur a ni.
Colocasia	A seng hun	KOLASIB	- A hnah te a eng (yellow) tan in a then an tla tan bawk a, chu chuan seng a hun a ni tih a lan tir. - Phun atanga thla 6-8 liam hnu ah seng theih a ni. - Seng dawnin uluk takin a zung nen phawi chhuah vek tur a ni. - Bal chu lahrangin ni hlimah pho hul tur a ni.
Baibing (Local vegetable)	A seng hun	MAMIT AIZAWL CHAMPA	- A kung bulah hnim a to tur a ni lo. - A rah hmin ho chu seng vek tur. - A kum leh atan a chi dah tur.
Tomato	Par a chhuah hma	SERCHHIP LUNGLEI	- Leichhung a boruak a luh that a zung alo that zawk theihnan hnim to pawhfai leh lei chawhphut thin tur. - Phun anih hnu ni 30-45 hnu ah lei chawhphut a rihvur tur. - A kung dawm tu tur in pal ban phun zel ni se, chu chuan a rah that leh a thar tam kawngah apui in a tangkai hle a ni. - Thlai bul tih hnawm nan a polythene dum hman hian hnim to tur a veng a, thlai a thang chak a, a par hma tir a, a thar tam phah tir bawk a ni.
		Bacterial Wilt LAWNGTLAI SAIHA	- Natna vei te chu a zung chawp a pawh phawi a hal ral vek tur. - Thlai chin dan thlakkual (crop rotation) hmangin he natna hi a tih ziaawm theih a ni. - Phun atanga thla khat hnu ah Bordeaux mixture (1:1:100) hmanga lei tih hnawn hi he natna enkawl nan hian a tangkai in a sawt em em a ni.
Early cole crop	Par a chhuah hma		Leichhung a boruak a luh that a zung alo that zawk theihnan hnim to pawhfai leh lei chawhphut thin



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	tur. - Bawr tha tak thar chhuah theih nan phunsawn a nih hnu atanga kar 4-5 thlang a bul chawhphut a lei tih thawl tur a ni. - Kar khat dan zel ah tui pek tur a ni. - A bawr (head) a keh chhiatloh nan a puitlin hun lai velin tui pek tamloh hram tur.
		N tlakchhamna	- He tlakchhamna hi neem cake @0.4kg/m² hmangin a enkawl dam theih a ni. - He natna hi a lo lan chuan 2 per cent urea hman tur.
		P tlakchhamna	- He tlakchhamna hi phosphorus based fertilizer @0.4kg/m² hmangin a enkawl dam theih a ni. - He natna hi a lo lan chuan 4 per cent DAP hman tur.
Capsicum	A chi kui hun	Poly house	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawk a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar
			- A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni. - A chi theh atanga ni 10-15 hnu ah tui litre khat ah 1% Bordeaux mixture emaw 2 g captan emaw 3 copper oxychloride emaw siam a a kuina hmun phuh hnawn tur.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Purunsen	A chi kui hun	Poly house	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawh a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar
	MAMIT	KOLASIB AIZAWL CHAMPAI	- A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni. - A chi theh atanga ni 10-15 hnu ah tui litre khat ah 1% Bordeaux mixture emaw 2 g captan emaw 3 copper oxychloride emaw siam a a kuina hmun phuh hnawn tur.
French Bean	A chi theh hun	SERCHHIP LUNGLEI	- A chi danglam leh hrisel, chang tha leh thianghlim chiah theh tur. - Thing ngul hman chi tan a chi theh inkar tur chu 60cm x 60 cm a ni. - A chi theh hma in a chi chu hectare khat ah Rhizobium vermicompost 10t hman a enkawl tur a ni.
Sawhthing leh Aieng	Par a chhuah hma	LAWNGTLAI SAIHA	- Thlai hnah, a tang ro leh hnim te chu paihfai vek tur. - Lin tirh (a to chhuah hma) in Atrazine (Atratraf 50wp, Gesaprim 500fw) 1.0-1.5kg a.i tui litre 600 ah pawlh tur a ni. Alachlor (Lasso) @2.25kga.i ha⁻¹ Metolachlor (Dual) @1.5-2.0 kg a.i ha⁻¹, Pendimethalin (Stomp)



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			@ 1-1.5kg a.i ha ⁻¹ te hian hnimhnah lian lampang chi a veng a ni.
		Turmeric shoot borer (Aieng kung ei chhetu rannung) KOLASIB	✚ Rannung hlo imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1.0g emaw dimethoate 2ml emaw tui litre khatah pawlh a, hman tur a ni.
Kharif rice	A puitling hun/a vui insiam tan hun	MAMIT AIZAWL CHAMPAI	✚ A rawng chu a hring atangin gold rawngah a inthlak ang. ✚ Tui tling luan chhuahna tur mumal tak a sir kil khatah siam tur. ✚ A vui hmasa te tana harsatna awmlo tur in tui tling te chu paih chhuah vek tur.
		Sazu tihchhiat SERCHHIP LUNGLEI	✚ Sazu chhenna hmun tihchhiat leh fai taka buh hmun enkawl zir. ✚ Buh hmun leh achheh vel a awmhmun an khuar theihna tur atana hmanraw remchang hnimhnah leh thlai ningnawi emaw buh bangnawi awmthei hrim hrim chu thenfai vek tur. ✚ Sazu in a a tihchhiat nasatna hmun ah chuan sazu hrai na tur 2 per cent Zinc phosphide (96 parts of broken rice + 2 parts of edible oil + 2 parts of 98% ZnP) hman tur a ni. ZNP tur (poison) hman hma in a thlem dan tur zir a enchhin hmasak phot tur a ni.
		Sava tihchhiat LAWNGTLAI SAIHA	✚ Meithal chi hrim hrim eng pek chhuah pah a bengchheng siam thei hmanrua ✚ Balloon hampuar buh kunga tawnbeh hi sava hnawhbo nan senso hautaklo si a hman thin a ni.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



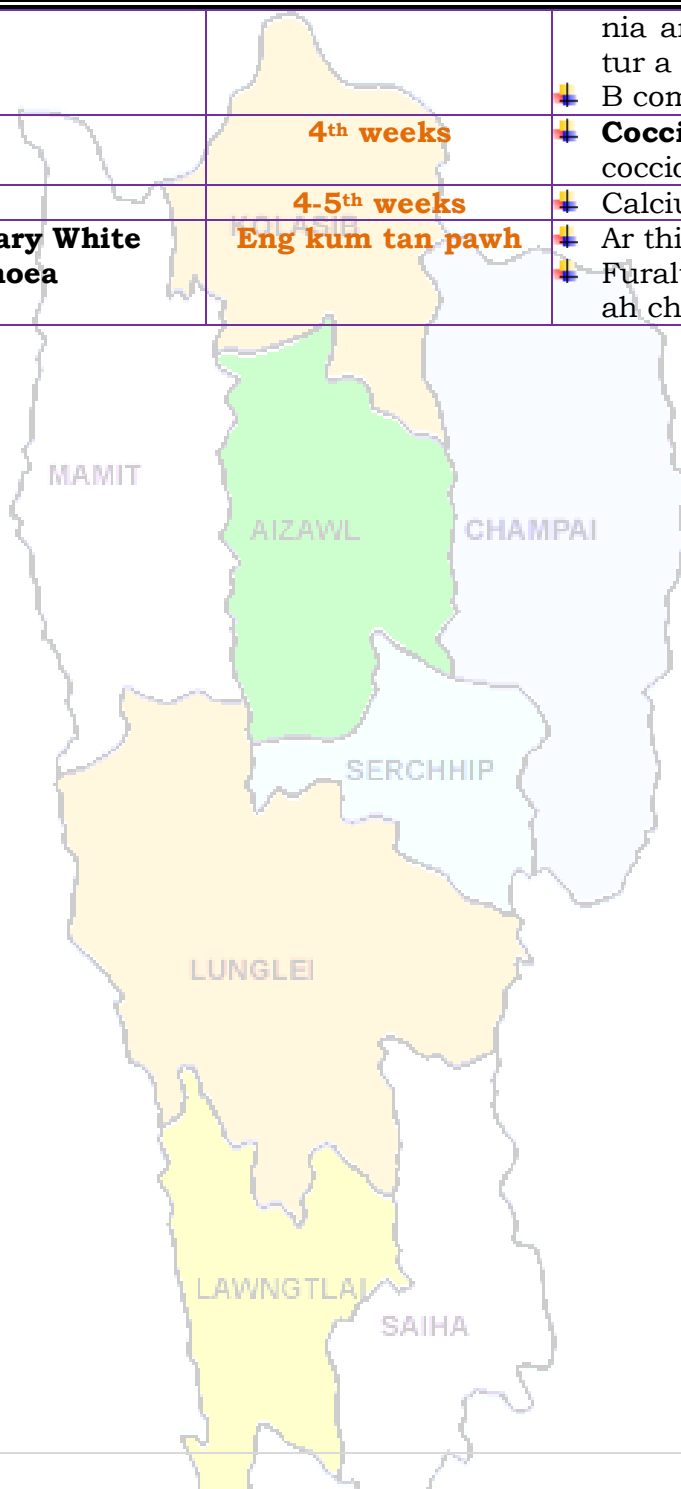
			Lekhachhaih hi sava hlahu atan hman thin a ni bawk.
		Rice yellow stem borer KOLASIB	- A hnah hmawr tan tur. - A kung hrisel lo lai paih tur - Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu tui chu kah tur.
Vawk	Kumtluanin	Vawk natna	Vawkin heng natna chi hrang hrang nguina, che tha theilo, ek tang emaw kawthalo ang chi an lan tir a nih chuan ran doctor pan a rawn vat tur.
		Porcine Reproductive Respiratory Syndrome (PRRS). MAMIT	1. A natna vei vawk te chu thah a phum tur a ni.
	A puitling hun	Swine fever.	2. Vawk thla hnih a nihin SF vaccine pek tur a ni a, he vaccine hi thla ruk emaw kumtluanin pek chhonzawm tur
Bawng	Kumtluanin	Foot and Mouth Disease (FMD)	Thla16 a upa an rih in FMD vaccine pek tur a nia, thla 6 danah pek chhonzawm tur a ni.
	A naupan lai	Black Quarter (BQ)	- Black Quarter Vaccine (BQ) - Thla ruk an tlin hunah vaccine lak tan tur. - Kumkhat hnu ah vaccine pek leh tur.
Ar	Ar ek enkawl dan		- Atui awpna in ah eng darkar 12-14 tal a in chhi tur a ni. - An ekna tur hmun chu cm 7.5 – 10 inkar vel a chhah tur a ni. - Thingzei nawi emaw buhpawl emaw badam kawr emaw tehi an ekna tur atan a phah theih a ni. - Heng buhpawl, thingzei nawi te hi hnawng reng a vawn theih nan chinai phul tur a ni.
	Natna thlengthei enkawl lawk dan	0-3 rd week	Ranikhet Disease- Ar note an pian hlimin F₁ vaccine pek tur a

GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)

			nia an puitlin hunah R ₂ B pek leh tur a ni.
		4 th weeks	B complex leh antibodies
		4-5 th weeks	Coccidiosis - Amprolium emaw coccidiostat pek tur.
	Bacillary White Diarrhoea	Eng kum tan pawh	Calcium tonic leh B ₁₂
			Ar thi zawng zawng hal ral vak tur
			Furaltadone 0.5g chu tui litre khat ah chawhpawlh a hman tur.





GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratanplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr Y. Ramakrishna	:	Farm manager (T-6)	ramakrishnaiari@rediffmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Dr. Lalmuanzovi	:	PC KVK Lunglei	kvklunglei@gmail.com kvknahtial@gmail.com
Mr. C. Lalthlamuana	:	PC KVK, Kolasib	kvkkolasib@gmail.com
Mrs. Lalnunpui Parte	:	PC KVK, Serchhip	Mmami997@yahoo.com kvkserchhip@gmail.com
Ms. Lalrinawnri Renthlei	:	PC KVK, Champhai	pckvkkhawzawl@rediffmail.com
Mr. Lalrosanga Khiantge	:	PC KVK, Lawngtlai	vvl9@rediffmail.com kvklawngtalai@rediffmail.com
Ms. C. Racheal	:	PC KVK, Saiha	kvksaiha@gmail.com rachoza@gmail.com
Mr. Vanlalhruaia Hnamte	:	PC KVK, Mamit	kvkmamit@yahoo.in
Dr. K. P. Chaudhary	:	PC KVK, Aizawl	Kpchy@rediffmail.com kvkaizawl@rediffmail.com



GRAMIN KRISHI MAUSAM SEWA
ICAR RESEARCH COMPLEX FOR NEH REGION
 Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Mamit

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/English

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	11	10	11	11	10
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	100	100	100	100	99
Min RH (%)	39	38	41	40	53
Wind Speed (Kmph)	2	2	2	2	2
*Wind Direction	E	E	E	E	S

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
 Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- June 1-30, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 384.87mm (430.2mm)	Champhai- 105.48mm (359.89mm)	Saiha- 307.40 mm (507.7mm)	Kolasib- 236.00mm (428.1mm)
Lawngtlai-291.20mm (453.1mm)	Lunglei-326.00mm (465.14mm)	Mamit-204.87mm (442.80mm)	Serchhip-411.72mm (259.62mm)

Weather summary of the past three days

Maximum Tem. (°C):23-24°C
Minimum Tem. (°C):12-14°C
Maximum RH (%):75-85%
Minimum RH (%):41-54%
Wind Direction: Southeasterly
Cloud cover: Mainly cloudy
Wind speed: 2 km/hr

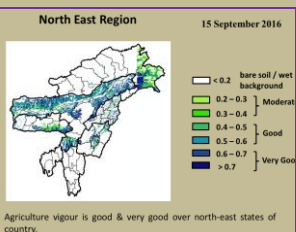
Rainfall: 00.0 mm

Weather forecast valid from 14th December, 2016 To 18th December, 2016.

There is no chance of rainfall during the next 5 days. The maximum and minimum temperatures for the next 5 days may range for 26-27°C and 10-11°C. Maximum relative humidity is expected in the range of 99-100% and minimum may from 38-53%. Wind direction would be easterly to southerly with the wind speed of 2 km per hour. Clear sky will prevail during the next five days.

Weekly cumulative rainfall: 00.0 mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Main Crop/ Animal /Fisheries	Stage	Cultural practices/ Pest/ Diseases	Agricultural / Horticultural/ animal husbandry advisories
Khasi Mandarin and acid lime	Harvesting stage	KOLASIB MAMIT AIZAWL	- Orange is picked when colour turn to dark green to pale yellow. - Mandarins and sweet oranges normally take 240-280 days to arrive at maturity. - Mature fruits at colour break stage are picked up in 2 - 3 intervals of 10-15 days. - Limes and lemons take 150-160 days for maturity. - There may be 2 or 3 crops in a year in limes and lemons. - The cold storage conditions for long term storage for different citrus fruits are available. - Oranges may be packed in well ventilated CFB boxes - 30 cm x 30 cm x 30 cm.
		Fruit fly	In large gardens apply carbaryl 0.2 per cent or malathion 0.15 per cent suspension containing sugar or jeggery at 10 g/l at fortnightly intervals at flowering and fruit initiation.
Banana	Harvesting stage	LUNGLEI LAWNGTLAI SAITAI	- Change of colour from green to yellowish. - Fingers are about three quarters full i.e. 3/4 of fruit is rounded - Ridges should still be prominent on the remaining quarter of the finger. - Harvest bananas when they are swollen and green but before they become ripe (plump and yellow). - Too early (when the bananas are thin and dark green). - Too late (when they are thick and turning yellow).
		Banana Rhizome weevil	Apply insecticide like imidacloprid 0.5 ml or phosolone 1.5 ml or acephate 1.0 g or dimethoate 2 ml /l at 50% egg hatching



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			stage when 1 st instars predominate which coincides with I Fortnight of July.
		Banana panama wilt	✚ Use disease free planting material. Roughing of infected plant and destroy them. Removing of excess male buds prevent disease spread. Disinfect the farm equipments.
		Banana beetle	✚ Removal of weeds from basin ✚ Removal of unwanted sucker ✚ Application of alphamethrin @ 0.01%.
Oil plam	Harvesting stage	AIZAWL	✚ Harvest only ripe fruit bunches and collect all loose fruit using high quality harvesting equipment. ✚ The oilplam will be ready for harvest ready for harvesting in 2.5 to 3 years after the plantation in the main field. ✚ Harvesting can be done when the fruit on plam turns into yellowish to orange colour. ✚ While harvesting a stalk length of 5 cm alone should be left. Harvesting should be done at 10-12 days interval. ✚ In young plantations, we get more bunches with less bunch weight and in adult plantations the bunch weight is more but the bunch number is less.
Tomato	Blight disease	LUNGLEI	✚ Prevailing weather may conducive for blight in Tomato. ✚ Cloudy and humid weather is most favorable for the disease. ✚ To manage the blight in tomato apply Ridomil or Indofil or Mancozeb @ 2 gm per liter of water.
Potato	Sowing stage	LAWNGTLAI	✚ Prepare the land for potato cultivation without any further delay. ✚ This may help to avoid some bacterial infection at growing stage. ✚ Land may be ploughed thoroughly for proper tillage. ✚ Seed must be treated before sowing. ✚ Light irrigation on every alternate day may be given for better establishment



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Early Cole crop	Black spot disease	KOLASIB	and smooth growth. - Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Prevailing weather may conducive for black spot disease in Cole Crops. - To manage the attack in leafy vegetables and Cole crops, Mancozeb @ 2gm per liter of water may be sprayed.
		MAMIT AIZAWL	Cutworm - Prevailing weather is conducive for the attack of cut worm which hide during day time in cracks of the soil and become active at dusk, feed on leave and cut the tender stem. - Apply cypermethrin or carbaryl 2 ml/lt of water or Tricel 1 ml/lt of water in evening every 10 days interval.
Onion	Nursery stage	Poly house SERCHHIP	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Spray Pendimethalin @ 3.5ml/lt of water in nursery which will give effective control of weed.
		LUNGLEI	- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
French bean	Sowing stage	LAWNGTLAI SAIHA	- Variable, healthy, well mature and pure seeds should be sown. - Optimum spacing for pole type 60 cm X 30 cm. - Before sowing seed should be treated with Rhizobium vermicompost@10 t/ha.
Carrot and			Carrots and radish are sown in raised



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



radish			beds having dimension of 1 metre breadth, any convenient length and raised from 15 to 30 cms. - In order to have an evenly sown crop the seeds are mixed with dry/ loose soil. - In this method the seeds are sown in lines with the help of a marker at a distance of 6 cms apart. - The seeds are then covered with loose and friable soil of about 2-4 cms again depending upon the rainfall and season. 90: 250: 130 Kg NPK will apply throughout the cropping season where whole quantity of Single Super Phosphate, Muriate of Potash and half the quantity of Urea is to be given as basal dose at the time of final preparation of the land.
Ginger and turmeric	Maturity stage		- Field must be inspected daily for disease appearance. - While inspecting, the healthy plants/plots must be marked and kept for planting in the next season. - Marking has to be done properly otherwise when plant matures and gets dried up, it will be very difficult to find out the marked plots.
Zero tillage pea and lentil cultivation in rice fellow	Sowing stage		- After harvesting of rice, pea and lentil will sow under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the rabi crops pea and lentil. - Pea and lentil will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 30 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			furrows before sowing of lentil seeds and covered the seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Zero tillage toria cultivation in rice fellow	Sowing stage		- After harvesting of rice, toria under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the toria crops. - Toria crop will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 50 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of toria seeds. Half dose of nitrogen fertilizer along with full dose of phosphorus and potash will apply at the time of sowing. - Seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Soybean	Pod formation stage	Zero tillage	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Earthing up soil near to plant for better support.
Green gram, black gram and French bean (After Pre kharif rice harvest)	Vegetative stage	Zero tillage	- Clear base of the plant. - Earthing up soil near to plant for better support. - For French bean use bamboo for staking or support. - Use split dose of fertilizer for better fruiting for French bean.
Rabi Maize	Sowing stage		- Prepare the land for maize cultivation without any further delay. - This may help to avoid some cob borer infestation. - Seed is being placed in furrows. - Seed should be treated with Thiram @4 g/kg seed. - Use optimum seed rate (20-25 kg/ha)



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	for desire plant population. Apply well decomposed FYM @ 5-10 t/ha along with 80:60:40 kg N, P₂O₅ and K₂O/ha incorporate with soil before sowing. Half nitrogen dose will use at the time of sowing and remaining 25% after one month and 25% at flowering stage.
Pig	All stages	MAMIT AIZAWL	- As the weather gets colder, your pigs' energy requirement will increase, as they need more energy to keep warm. - Regularly monitor their level of 'fitness' and increase their feed intake to maintain. - Fish oils are excellent for providing slow-release energy with the added advantage of a high level of omega-3.
		Porcine Reproductive Respiratory Syndrome (PRRS).	1. Culling of positive pigs or piglets.
	Adult stage	Swine fever.	2. Vaccination of pigs with SF vaccines at 2 months and yearly interval/6 month interval
Cattle	All age group	LUNGLEI	Due to prolong dry spell there is a shortage of green grass in the field. For balanced diet and nutrition to your cattle, provide urea molasses treated paddy straw.
	All age group	Foot and Mouth Disease (FMD)	FMD vaccine at 16 week and repeat every 6 month.
	Young stage	Black Quarter (BQ)	- Black Quarter Vaccine (BQV). ❖ Primary vaccination 6 month or above ❖ Revaccination annually
Poultry	Litter management	LAWNGTLAI SAIHA	Birds require adequate space, sufficient feed to meet their nutritional requirements and an adequate supply of good-quality water.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	- Good management and sanitation are the best ways to avoid infectious disease in poultry. - Provide ample quantity of clean drinking water. - Avoid feeding of mouldy feed. Don't make sudden changes in feed
	Preventive measures	0-3 rd week	Ranikhet Disease- F1 vaccine at (1-6) days of birth and R₂B vaccine for adult birds. - B complex with antibodies
		4 th weeks	Coccidiosis- Amprolium or coccidiostat
		4-5 th Weeks	Calcium tonic fortified with B₁₂
Fish	All age group	MAMIT AIZAWL SERCHHIP LUNGLEI LAWNGTLAI SAIHA	- An extra dose of Lime @ 200 kg per ha may be applied to prevent the outbreak of EUS (ulcer disease). - Feeding and fertilizer need to be analyzed as per the depth of the water body. - If the depth of water body drop below 1 mt, cut short the feeding and fertilizer by 1/3rd.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratantplantpatho@gmail.com
Dr. L. H. Puii	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr. M. Thoithoi Devi	:	Scientist (Agronomy)	thoiagri@gmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Name of the KVK	Programme Coordinator Name and Designation	KVK Email Id	Phone no/ Mobile no
KVK Lunglei	Dr. Lalmuanzovi Head & Sr. Scientist	kvkhnahthial@gmail.com	9862803750 9436154614
KVK, Kolasib	Mr. Lalrosamga Khiangte Head & Sr. Scientist	kvkkolasib@gmail.com	9436152440
KVK, Serchhip	Mr. K. Laltlanmawia Head & Sr. Scientist	kvkserchhip@gmail.com	9436146115 9615389293
KVK, Champhai	Mrs. Lalrinawmi Renthlei Head & Sr. Scientist	kvkchawzawl@gmail.com	9436159788
KVK, Lawngtlai	Dr. Michel Lallawmkimi Head & Sr. Scientist	kvklawntlai@gmail.com	9436155858
KVK, Saiha	Dr. Vanlalhruaia Hnampe Head & Sr. Scientist	kvksaiha@gmail.com	8974656509
KVK, Mamit	Dr. Samuel Lalliansanga Head & Sr. Scientist	kvkmamit@gmail.com	9436147625
KVK, Aizawl	Dr. K. P. Chaudhary Head & Sr. Scientist	Kpchy@rediffmail.com kvkaizawl@rediffmail.com	9436351669



GRAMIN KRISHI MAUSAM SEWA
ICAR RESEARCH COMPLEX FOR NEH REGION
 Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Mamit

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/Mizo

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	11	10	11	11	10
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	100	100	100	100	99
Min RH (%)	39	38	41	40	53
Wind Speed (Kmph)	2	2	2	2	2
*Wind Direction	E	E	E	E	S

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
 Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- May 1-31, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 383.68mm (341.8mm)	Champhai- 239.49mm (250.30mm)	Saiha- 109.52 mm (87.2mm)	Kolasib- 352.38mm (380.9mm)
Lawngtlai-321.51mm (285.5mm)	Lunglei-344.00mm (186.21mm)	Mamit-449.48mm (442.80mm)	Serchhip-411.72mm (259.63mm)

**Ni thum kalta sik leh sa
 dinhmun tlangpui**

**14th December– 18th December, 2016
 chhunga sik leh sa dinhmun tur tlangpui**

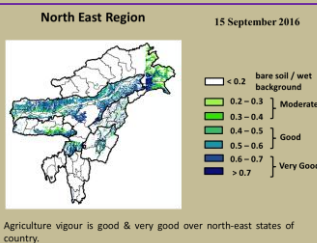
Maximum Tem. (°C):23-24°C
Minimum Tem. (°C):12-14°C
Maximum RH (%):75-85%
Minimum RH (%):41-54%
Wind Direction: Southeasterly
Cloud cover: Mainly cloudy
Wind speed: 2 km/hr

Tun ni 5 chhung lo awm turah hian ruahtui tla miahlo tura beisei a ni. Khua a lum lai berin 26-27°C a ni ang a. A vawh lai ber in 10-11°C ni tura beisei a ni. RH san lai berin 99-100% leh a hniam lai berin 38-53% ni tur a rin niin. Thli hi darkar khatah 2 km vela chakin chhaklam awi zawngin a tleh rin a ni. A tlangpuiin tun ni nga chhung hian khawthiang tak hmuh beisei a ni.

Rainfall: 00.0 mm

Weekly cumulative rainfall: 00.0mm

***/NDVI for Mizoram**



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Thlai/ ran /sangha	Spat zawng	Hmalakna tur/ rannung leh natna hrik awm thei te	Agricultural/Horticultural/ animal husbandry atana thurawn
Khasi Mandarin leh acid lime	Seng (Harvesting) hun		- Serthlum rah chu a hringduk atanga rawng eng dala arawn inthlak hunah lawh tur a ni. - Mandarins leh sweet oranges te hian an puitlin nan ni 240-280 vel an mamawh. - A rah puitling tawhin a hmin rawng a rawn chhuah tan hunah lawh tur a ni a, ni 10-15 inkar danah wawi 2- 3 lawh tur a ni - Limes leh lemons hian puitlin nan ni 150-160 an mamawh. - Limes leh lemons te hi kum khatah wawi 2 emaw wawi 3 emaw an rah thei. - Rei tak dahthat theihna tur vur bawm (cold storage)changtlung tak ser rah chi hrang hrang tan a awm hrang vek bawk a ni. - Ser rah te chu boruak thianghlim luh theihna tur bawm (CFB Box) 30 cm x 30cm x 30 cm azau ah pack fel tur a ni.
		Ser rah bawmtu rannung thlawkthei (Fruitfly)	Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
Sapthei	Seng (Harvesting) hun		- A kung phun a nih atanga thla sawm hnu ah rah a pe chhuak tan a, chuan thla 16-18 a nih thlengin a rah chhunzawm ta thin a ni. - Rah hun bik hi tum hnih (2) a nei a chu chu August -



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			December leh March- May ah te an ni. - A rah hmin nan ni 80-85 vel a mamawh thin. - A rah rawn senduk (purple) toh chu a kuang tlem a zawng nen lawh tel tur a ni. - A rah seng tawh ho chu a pian hmang leh rihna te a tlakhniam hma in a rang lam a hralh zawh vat tur a ni. - A ro hnu in a kor te chu zur angin lang mahse a chhung lam erawh ni engemaw chen chu ala tha vek thung ang. - A kung a natna nei te chu lakkhawm a hal ral vek tur. - Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
		Sapthei rah bawmtu rannung thlawkthei (Fruitfly)	
Balhla	Seng (Harvesting) hun		- A hring atanga a eng a a inthlak hunah . - A thlar a balhla ho hmun li a then a hmun thum an pum that a a bak zawngin kil anla neih lain. - Balhla hi anla puam a an hrin that lai mahse an hmin hma si in. - Balhla te an sin lai leh rawng hring duk anla nih lai chuan sengloh tur a ni. - Rawng eng an nih tawh chuan seng nan a tlai tawh tihna a ni.
		Balhla zung eichhetu rannung (Banana Rhizome)	Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		weevil)	tui chu rannung tui 50 per cent a keu hun velah kah tur a ni (July kar hmasa ber a ni tlangpui).
		Banana panama wilt	Natna kai lo chauh phun tur. Natna kai ho chu a zung nen kara paih tur. Farm-a hmanraw hrang hrangte natna hrik kai lo tura tihfai thin bawk tur a ni.
		Banana beetle	A bul vela hnim to tihfai tur A no rawn chawr thar mamawh loh te paih tur Alphamethrin 0.01 per cent hman tur
Oil palm	A rah insiam tan hunlai	AIZAWL CHAMPA SERCHHIP	A nu leh pa par hma lutuk te thenfai tur Heihian a kung a ti thag tha in zung a kaih ngheh tir bik thin a ni. Phun atanga thla 14-18 velah an par tlangpui A par nu leh pa hi a kung in vui a rawn chhuah tan tirh ah pawh phawi vat tur anni. Kut in emaw a pawhphawina hmanrua DOPR in ansiam hmangin awlsam takin a tih theih a ni. Hetiang a par nu leh pa lak hi kum hnih leh chanve atanga kum thum annih vel thlengin a tih zawm theih a ni.
		LUNGLEI LAWNGTLAI SAIHA	Thli leh rannung ten inthlahchhawanna kawngah an pui thin a, amaherawhchu thli hmanga inthlahchhawanna erawh hichuan a thawh hlawklo. Inthlahchhawn nan a rannung tangkai tak <i>Elaeidobius kamerunicus</i> hian a inthlahchhawanna ah leh a rah tur insiam kawngah a pui nasa hle a ni. Phun anih atanga kum hnih leh chanve hnu ah he rannung hi chhuah a tha a, kum thum hnu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			a a kung in a that puiloh anih chuan he rannung hi chhuah vek tur a ni.
Colocasia	A seng hun	KOLASIB	- A hnah te a eng (yellow) tan in a then an tla tan bawk a, chu chuan seng a hun a ni tih a lan tir. - Phun atanga thla 6-8 liam hnu ah seng theih a ni. - Seng dawnin uluk takin a zung nen phawi chhuah vek tur a ni. - Bal chu lahrangin ni hlimah pho hul tur a ni.
Tomato	A chi kui hun	A chi kuitiahna hmun tur siam dan	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawk a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar hlat zawng hi 7-10 cm tur a ni.
		Nursery natna (Damping off)	A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni.
Sawhthing leh Aieng	Par a chhuah hma	LAWNGTLAI SAIHA	- Thlai hnah, a tang ro leh hnim te chu paihfai vek tur. - Lin tirh (a to chhuah hma) in Atrazine (Atratraf 50wp, Gesaprim 500fw) 1.0-1.5kg a.i tui litre 600 ah pawlh tur a ni. Alachlor (Lasso) @2.25kga.i ha⁻¹ Metolachlor (Dual) @1.5-2.0 kg a.i ha⁻¹, Pendimethalin (Stomp) @ 1-1.5kg a.i ha⁻¹ te hian hnimhnah lian lampang chi a



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Turmeric shoot borer (Aieng kung ei chhetu ranning)	veng a ni. ✚ Ranning hlo imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1.0g emaw dimethoate 2ml emaw tui litre khatah pawlh a, hman tur a ni.
Kharif rice	A puitling hun/a vui insiam tan hun	KOLASIB	✚ A rawng chu a hring atangin gold rawngah a inthlak ang. ✚ Tui tling luan chhuahna tur mumal tak a sir kil khatah siam tur. ✚ A vui hmasa te tana harsatna awmlo tur in tui tling te chu paih chhuah vek tur.
		MAMIT	
		Sazu tihchhiat	✚ Sazu chhenna hmun tihchhiat leh fai taka buh hmun enkawl zir. ✚ Buh hmun leh achheh vel a awmhmun an khuar theihna tur atana hmanraw remchang hnimhna leh thlai ningnawi emaw buh bangnawi awmthei hrim hrim chu thenfai vek tur. ✚ Sazu in a a tihchhiat nasatna hmun ah chuan sazu hrai na tur 2 per cent Zinc phosphide (96 parts of broken rice + 2 parts of edible oil + 2 parts of 98% ZnP) hman tur a ni. ZNP tur (poison) hman hma in a thlem dan tur zir a enchhin hmasak phot tur a ni.
		AIZAWL	
		CHAMPAI	
		SERCHHIP	
		LUNGLEI	
		Sava tihchhiat	✚ Meithal chi hrim hrim eng pek chhuah pah a bengchheng siam thei hmanrua ✚ Balloon hampuar buh kunga tawnbeh hi sava hnawhbo nan senso hautaklo si a hman thin a ni. ✚ Lekhachhaih hi sava hlauh atan hman thin a ni bawk.
		LAWNGTLAI	
		SAIHA	



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Rice yellow stem borer	- A hnah hmawr tan tur. - A kung hrisel lo lai paih tur - Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu tui chu kah tur.
Bekang	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut thin tur.
Green gram, black gram leh French bean (nipui buh seng zawh hunah)	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut rih vur thin tur. - French bean tan bik athlawp tu atan mau hman tur. - A rah athat lehzuall nan French bean tan bik chuan mumal takin a in henin leitha pek tur.
Vawk	Kumtluanin	Vawk natna	Vawkin heng natna chi hrang hrang nguina, che tha theilo, ek tang emaw kawthalo ang chi an lan tir a nih chuan ran doctor pan a rawn vat tur.
		Porcine Reproductive Respiratory Syndrome (PRRS).	1. A natna vei vawk te chu thah a phum tur a ni.
	A puitling hun	Swine fever.	2. Vawk thla hnih a nihin SF vaccine pek tur a ni a, he vaccine hi thla ruk emaw kumtluanin pek chhunzawm tur
Bawng	Kumtluanin	Foot and Mouth Disease (FMD)	Thla16 a upa an rih in FMD vaccine pek tur a nia, thla 6 danah pek chhunzawm tur a ni.
	A naupan lai	Black Quarter (BQ)	- Black Quarter Vaccine (BQ) - Thla ruk an tlin hunah vaccine lak tan tur. - Kumkhat hnu ah vaccine pek leh tur.
Ar	Ar ek enkawl dan		Atui awpna in ah eng darkar 12-



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	14 tal a in chhi tur a ni. • An ekna tur hmun chu cm 7.5 – 10 inkar vel a chhah tur a ni. • Thingzei nawi emaw buhpawl emaw badam kawr emaw tehi an ekna tur atan a phah theih a ni. • Heng buhpawl, thingzei nawi te hi hnawng reng a vawn theih nan chinai phul tur a ni.
	Natna thlengthei enkawl lawk dan	0-3 rd week	✚ Ranikhet Disease- Ar note an pian hlimin F₁ vaccine pek tur a nia an puitlin hunah R₂B pek leh tur a ni. ✚ B complex leh antibodies
		4 th weeks	✚ Coccidiosis- Amprolium emaw coccidiostat pek tur.
		4-5 th weeks	✚ Calcium tonic leh B₁₂
	Bacillary White Diarrhoea	Eng kum tan pawh	✚ Ar thi zawng zawng hal ral vak tur ✚ Furaldone 0.5g chu tui litre khat ah chawhpawlh a hman tur.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratanplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr Y. Ramakrishna	:	Farm manager (T-6)	ramakrishnaiari@rediffmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Dr. Lalmuanzovi	:	PC KVK Lunglei	kvklunglei@gmail.com kvknahtial@gmail.com
Mr. C. Lalthlamuana	:	PC KVK, Kolasib	kvkkolasib@gmail.com
Mrs. Lalnunpui Parte	:	PC KVK, Serchhip	Mmami997@yahoo.com kvkserchhip@gmail.com
Ms. Lalrinawnri Renthlei	:	PC KVK, Champhai	pckvkkhawzawl@rediffmail.com
Mr. Lalrosanga Khiantge	:	PC KVK, Lawngtlai	vvl9@rediffmail.com kvklawngtalai@rediffmail.com
Ms. C. Racheal	:	PC KVK, Saiha	kvksaiha@gmail.com rachoza@gmail.com
Mr. Vanlalhruaia Hnamte	:	PC KVK, Mamit	kvkmamit@yahoo.in
Dr. K. P. Chaudhary	:	PC KVK, Aizawl	Kpchy@rediffmail.com kvkaizawl@rediffmail.com



GRAMIN KRISHI MAUSAM SEWA
ICAR RESEARCH COMPLEX FOR NEH REGION
 Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Saiha

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/English

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	11	10	11	11	12
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	96	96	97	97	98
Min RH (%)	33	30	38	40	53
Wind Speed (Kmph)	4	4	4	4	4
*Wind Direction	E	E	E	E	E

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
 Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- June 1-30, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 384.87mm (430.2mm)	Champhai- 105.48mm (359.89mm)	Saiha- 307.40 mm (507.7mm)	Kolasib- 236.00mm (428.1mm)
Lawngtlai-291.20mm (453.1mm)	Lunglei-326.00mm (465.14mm)	Mamit-204.87mm (442.80mm)	Serchhip-411.72mm (259.62mm)

Weather summary of the past three days

Maximum Tem. (°C): 16-18°C
Minimum Tem. (°C): 3-7°C
Maximum RH (%):72-85%
Minimum RH (%):35-48%
Wind Direction: Southeasterly
Cloud cover: Mainly cloudy
Wind Speed: 2km/hr

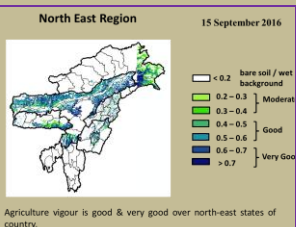
Rainfall: 00.0 mm

Weather forecast valid from 14th December, 2016 To 18th December, 2016.

There is no chance of rainfall during the next 5 days. The maximum and minimum temperatures for the next 5 days may range for 26-27°C and 10-12°C. Maximum relative humidity is expected in the range of 96-98% and minimum may from 30-53%. Wind direction would be easterly with the wind speed of 4 km per hour. Clear sky will prevail during the next five days.

Weekly cumulative rainfall: 00.0 mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions

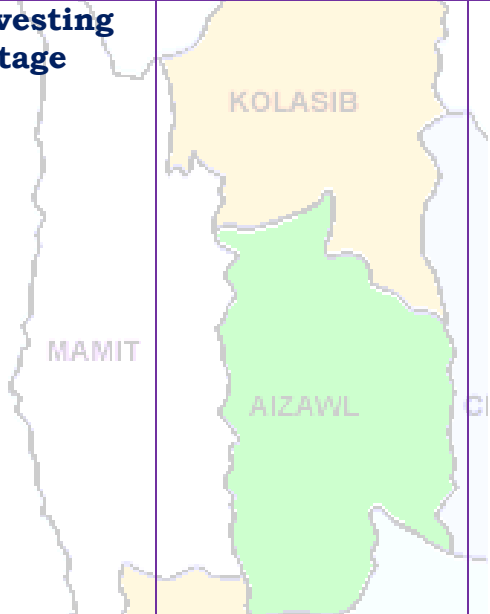
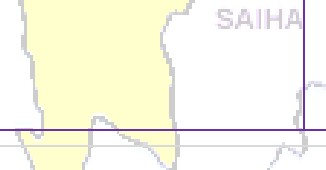


GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Main Crop/ Animal /Fisheries	Stage	Cultural practices/ Pest/ Diseases	Agricultural / Horticultural/ animal husbandry advisories
Khasi Mandarin and acid lime	Harvesting stage		- Orange is picked when colour turn to dark green to pale yellow. - Mandarins and sweet oranges normally take 240-280 days to arrive at maturity. - Mature fruits at colour break stage are picked up in 2 - 3 intervals of 10-15 days. - Limes and lemons take 150-160 days for maturity. - There may be 2 or 3 crops in a year in limes and lemons. - The cold storage conditions for long term storage for different citrus fruits are available. - Oranges may be packed in well ventilated CFB boxes - 30 cm x 30 cm x 30 cm.
Oil plam	Harvesting stage		- Harvest only ripe fruit bunches and collect all loose fruit using high quality harvesting equipment. - The oilplam will be ready for harvest ready for harvesting in 2.5 to 3 years after the plantation in the main field. - Harvesting can be done when the fruit on plam turns into yellowish to orange colour. - While harvesting a stalk length of 5 cm alone should be left. Harvesting should be done at 10-12 days interval. - In young plantations, we get more bunches with less bunch weight and in adult plantations the bunch weight is more but the bunch number is less.
Colocasia	Harvesting stage		- Leaves have started turning yellow and some of them have fallen off, signaling the time for harvesting the corms. - Crop will be ready for harvest in 6-8



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	months after planting. - One month prior to harvest, all the suckers may be wrapped around the base of the mother plant and covered with soil by earthing up, for arresting further vegetative growth and sprouting of tubers. - After this, irrigation has to be withheld to hasten maturity. - Harvesting is done by carefully uprooting the plants and the mother corms and cormels are separated.
Tomato	Flowering to fruit formation stage	AIZAWL	- Prevailing weather may conducive for blight in Tomato. - Cloudy and humid weather is most favorable for the disease. - To manage the blight in tomato apply Ridomil or Indofil or Mancozeb @ 2 gm per liter of water.
		Bacterial wilt	- Uproot all infected plant and burn it. - This disease can be minimized by practicing crop rotation. - Soil dranching with Bordeaux mixture (1:1:100) after one month of planting is effective method to manage this disease.
		Fruit fly	In large gardens apply carbaryl 0.2 per cent or malathion 0.15 per cent suspension containing sugar or jeggery at 10 g/l at fortnightly intervals at flowering and fruit initiation.
Early Cole crop	Black spot disease	LAWNGTLAI	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Prevailing weather may conducive for black spot disease in Cole Crops. - To manage the attack in leafy vegetables and Cole crops,



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			Mancozeb @ 2gm per liter of water may be sprayed.
		Cutworm KOLASIB	- Prevaling weather is conducive for the attack of cut worm which hide during day time in cracks of the soil and become active at dusk, feed on leave and cut the tender stem. - Apply cypermethrin or carbaryl 2 ml/lt of water or Tricel 1 ml/lt of water in evening every 10 days interval.
Capsicum	Nursery stage	Poly house MAMIT	- Raised bed, nursery bed solarisation. - Bed should be 1m width and conventional length. - Application of FYM (1.5-2.0 kg/ m²) - Line sowing of seeds (7-10cm)
		AIZAWL	- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
Carrot and radish	Sowing stage	SERCHHIP LUNGLEI LAWNGTLAI SAIHA	- Carrots and radish are sown in raised beds having dimension of 1 metre breadth, any convenient length and raised from 15 to 30 cms. - In order to have an evenly sown crop the seeds are mixed with dry/ loose soil. - In this method the seeds are sown in lines with the help of a marker at a distance of 6 cms apart. - The seeds are then covered with loose and friable soil of about 2-4 cms again depending upon the rainfall and season. 90: 250: 130 Kg NPK will apply throughout the cropping season where whole quantity of Single Super Phosphate, Muriate of Potash and half the quantity of Urea is to be given as basal dose at the time of final preparation of the land.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Potato	Sowing	KOLASIB	- Prepare the land for potato cultivation without any further delay. - This may help to avoid some bacterial infection at growing stage. - Land may be ploughed thoroughly for proper tillage. - If land is prepared good quality of seeds may be collected for planting. - Cultivation from TPS is also found profitable. - Seed must be treated before sowing.
Onion	Nursery stage	MAMIT AIZAWL Poly house	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Spray Pendimethalin @ 3.5ml/lt of water in nursery which will give effective control of weed.
		SERCHHIP	- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
Brussels sprout	Nursery stage	LUNGLEI	- Raised bed, nursery bed solarisation. - Bed should be 1m width and conventional length. - Application of FYM (1.5-2.0 kg/ m²) - Line sowing of seeds (7-10cm)
			- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
French bean	Sowing stage	LAWNGTLAI SAIHA	- Variable, healthy, well mature and pure seeds should be sown. - Optimum spacing for pole type 60 cm X 30 cm. - Before sowing seed should be treated with Rhizobium vermicompost@10



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Ginger and turmeric	Maturity stage	KOLASIB	t/ha. - Field must be inspected daily for disease appearance. - While inspecting, the healthy plants/plots must be marked and kept for planting in the next season. - Marking has to be done properly otherwise when plant matures and gets dried up, it will be very difficult to find out the marked plots.
Zero tillage pea and lentil cultivation in rice fellow	Sowing stage	MAMIT AIZAWL CHAMPA SERCHHIP	- After harvesting of rice, pea and lentil will sow under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the rabi crops pea and lentil. - Pea and lentil will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 30 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of lentil seeds and covered the seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Pig	All stages	Swine flu LUNGLEI LAWNGTLAI SAIHA	- Swine flu may occur in pig at all stages. It is a viral flu and highly contagious. Clinical signs include high fever, skin lesions, convulsions, constipation followed by diarrhea and vomiting, less appetite. - In pregnant animals abortion or still birth or weak litters may also happen. Once the symptoms is noticed, immediately informed the nearby veterinary Doctor. Maintain hygiene of the shed with application of Potassium Per Manganite (1-2 gm per in 15 litter of water) and lime both inside and outside of



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Porcine Reproductive Respiratory Syndrome (PRRS).	1. Culling of positive pigs or piglets.
	Adult stage	Swine fever.	2. Vaccination of pigs with SF vaccines at 2 months and yearly interval/6 month interval
Cattle	All age group		Due to prolong dry spell there is a shortage of green grass in the field. For balanced diet and nutrition to your cattle, provide urea molasses treated paddy straw.
	All age group	Foot and Mouth Disease (FMD)	FMD vaccine at 16 week and repeat every 6 month.
	Young stage	Black Quarter (BQ)	- Black Quarter Vaccine (BQV). ❖ Primary vaccination 6 month or above ❖ Revaccination annually
Poultry	Litter management		- Good management and sanitation are the best ways to avoid infectious disease in poultry. - Provide ample quantity of clean drinking water. - Avoid feeding of mouldy feed. Don't make sudden changes in feed
	Preventive measures	0-3rd week	Ranikhet Disease- F1 vaccine at (1-6) days of birth and R₂B vaccine for adult birds. - B complex with antibodies
		4th weeks	Coccidiosis- Amprolium or coccidiostat



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratanplantpatho@gmail.com
Dr. L. H. Puii	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr. M. Thoithoi Devi	:	Scientist (Agronomy)	thoiagri@gmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Name of the KVK	Programme Coordinator Name and Designation	KVK Email Id	Phone no/ Mobile no
KVK Lunglei	Dr. Lalmuanzovi Head & Sr. Scientist	kvkhnahthial@gmail.com	9862803750 9436154614
KVK, Kolasib	Mr. Lalrosamga Khiangte Head & Sr. Scientist	kvkkolasib@gmail.com	9436152440
KVK, Serchhip	Mr. K. Laltlanmawia Head & Sr. Scientist	kvkserchhip@gmail.com	9436146115 9615389293
KVK, Champhai	Mrs. Lalrinawmi Renthlei Head & Sr. Scientist	kvkchawzawl@gmail.com	9436159788
KVK, Lawngtlai	Dr. Michel Lallawmkimi Head & Sr. Scientist	kvklawntlai@gmail.com	9436155858
KVK, Saiha	Dr. Vanlalhruaia Hnampe Head & Sr. Scientist	kvksaiha@gmail.com	8974656509
KVK, Mamit	Dr. Samuel Lalliansanga Head & Sr. Scientist	kvkmamit@gmail.com	9436147625
KVK, Aizawl	Dr. K. P. Chaudhary Head & Sr. Scientist	Kpchy@rediffmail.com kvkaizawl@rediffmail.com	9436351669



GRAMIN KRISHI MAUSAM SEWA

ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Saiha

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/Mizo

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	11	10	11	11	12
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	96	96	97	97	98
Min RH (%)	33	30	38	40	53
Wind Speed (Kmph)	4	4	4	4	4
*Wind Direction	E	E	E	E	E

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- May 1-31, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 383.68mm (341.8mm)	Champhai- 239.49mm (250.30mm)	Saiha- 109.52 mm (87.2mm)	Kolasib- 352.38mm (380.9mm)
Lawngtlai-321.51mm (285.5mm)	Lunglei-344.00mm (186.21mm)	Mamit-449.48mm (442.80mm)	Serchhip-411.72mm (259.63mm)

**Ni thum kalta sik leh sa
dinhmun tlangpui**

**14th December– 18th December, 2016
chhunga sik leh sa dinhmun tur tlangpui**

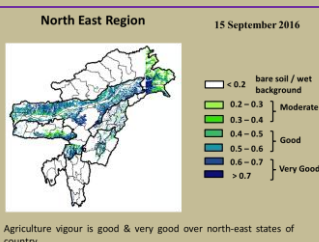
Maximum Tem. (°C): 16-18°C
Minimum Tem. (°C): 3-7°C
Maximum RH (%):72-85%
Minimum RH (%):35-48%
Wind Direction: Southeasterly
Cloud cover: Mainly cloudy
Wind Speed: 2km/hr

Tun ni 5 chhung lo awm turah hian ruahtui tla miahlo tura beisei a ni. Khua a lum lai berin 26-27°C a ni ang a. A vawh lai ber in 10-12°C ni tura beisei a ni. RH san lai berin 96-98% leh a hniam lai berin 30-53% ni tur a rin niin. Thli hi darkar khatah 4 km vela chakin chhaklam awi zawngin a tleh rin a ni. A tlangpuiin tun ni nga chhung hian khawthiang tak hmuh beisei a ni.

Rainfall: 00.0 mm

Weekly cumulative rainfall: 00.0mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Thlai/ ran /sangha	Spat zawng	Hmalakna tur/ rannung leh natna hrik awm thei te	Agricultural/Horticultural/ animal husbandry atana thurawn
Khasi Mandarin leh acid lime	Seng (Harvesting) hun		- Serthlum rah chu a hringduk atanga rawng eng dala arawn inthlak hunah lawh tur a ni. - Mandarins leh sweet oranges te hian an puitlin nan ni 240-280 vel an mamawh. - A rah puitling tawhin a hmin rawng a rawn chhuah tan hunah lawh tur a ni a, ni 10-15 inkar danah wawi 2- 3 lawh tur a ni - Limes leh lemons hian puitlin nan ni 150-160 an mamawh. - Limes leh lemons te hi kum khatah wawi 2 emaw wawi 3 emaw an rah thei. - Rei tak dahthat theihna tur vur bawm (cold storage)changtlung tak ser rah chi hrang hrang tan a awm hrang vek bawk a ni. - Ser rah te chu boruak thianghlim luh theihna tur bawm (CFB Box) 30 cm x 30cm x 30 cm azau ah pack fel tur a ni.
		Ser rah bawmtu rannung thlawkthei (Fruitfly)	Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
Sapthei	Seng (Harvesting) hun		- A kung phun a nih atanga thla sawm hnu ah rah a pe chhuak tan a, chuan thla 16-18 a nih thlengin a rah chhunzawm ta thin a ni. - Rah hun bik hi tum hnih (2) a nei a chu chu August -



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			December leh March- May ah te an ni. - A rah hmin nan ni 80-85 vel a mamawh thin. - A rah rawn senduk (purple) toh chu a kuang tlem a zawng nen lawh tel tur a ni. - A rah seng tawh ho chu a pian hmang leh rihna te a tlakhniam hma in a rang lam a hralh zawh vat tur a ni. - A ro hnu in a kor te chu zur angin lang mahse a chhung lam erawh ni engemaw chen chu ala tha vek thung ang. - A kung a natna nei te chu lakkhawm a hal ral vek tur. - Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
		Sapthei rah bawmtu rannung thlawkthei (Fruitfly)	
Balhla	Seng (Harvesting) hun		- A hring atanga a eng a a inthlak hunah . - A thlar a balhla ho hmun li a then a hmun thum an pum that a a bak zawngin kil anla neih lain. - Balhla hi anla puam a an hrin that lai mahse an hmin hma si in. - Balhla te an sin lai leh rawng hring duk anla nih lai chuan sengloh tur a ni. - Rawng eng an nih tawh chuan seng nan a tlai tawh tihna a ni.
		Balhla zung eichhetu rannung (Banana Rhizome)	Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		weevil)	tui chu rannung tui 50 per cent a keu hun velah kah tur a ni (July kar hmasa ber a ni tlangpui).
		Banana panama wilt	Natna kai lo chauh phun tur. Natna kai ho chu a zung nen kara paih tur. Farm-a hmanraw hrang hrangte natna hrik kai lo tura tihfai thin bawk tur a ni.
		Banana beetle	A bul vela hnim to tihfai tur A no rawn chawr thar mamawh loh te paih tur Alphamethrin 0.01 per cent hman tur
Oil palm	A rah insiam tan hunlai	AIZAWL CHAMPA SERCHHIP	A nu leh pa par hma lutuk te thenfai tur Heihian a kung a ti thag tha in zung a kaih ngheh tir bik thin a ni. Phun atanga thla 14-18 velah an par tlangpui A par nu leh pa hi a kung in vui a rawn chhuah tan tirh ah pawh phawi vat tur anni. Kut in emaw a pawhphawina hmanrua DOPR in ansiam hmangin awlsam takin a tih theih a ni. Hetiang a par nu leh pa lak hi kum hnih leh chanve atanga kum thum annih vel thlengin a tih zawm theih a ni.
		LUNGLEI LAWNGTLAI SAIHA	Thli leh rannung ten inthlahchhawanna kawngah an pui thin a, amaherawhchu thli hmanga inthlahchhawanna erawh hichuan a thawh hlawklo. Inthlahchhawn nan a rannung tangkai tak <i>Elaeidobius kamerunicus</i> hian a inthlahchhawanna ah leh a rah tur insiam kawngah a pui nasa hle a ni. Phun anih atanga kum hnih leh chanve hnu ah he rannung hi chhuah a tha a, kum thum hnu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			a a kung in a that puiloh anih chuan he rannung hi chhuah vek tur a ni.
Colocasia	A seng hun	KOLASIB	- A hnah te a eng (yellow) tan in a then an tla tan bawk a, chu chuan seng a hun a ni tih a lan tir. - Phun atanga thla 6-8 liam hnu ah seng theih a ni. - Seng dawnin uluk takin a zung nen phawi chhuah vek tur a ni. - Bal chu lahrangin ni hlimah pho hul tur a ni.
Baibing (Local vegetable)	A seng hun	MAMIT AIZAWL CHAMPA	- A kung bulah hnim a to tur a ni lo. - A rah hmin ho chu seng vek tur. - A kum leh atan a chi dah tur.
Tomato	Par a chhuah hma	SERCHHIP LUNGLEI	- Leichhung a boruak a luh that a zung alo that zawk theihnan hnim to pawhfai leh lei chawhphut thin tur. - Phun anih hnu ni 30-45 hnu ah lei chawhphut a rihvur tur. - A kung dawm tu tur in pal ban phun zel ni se, chu chuan a rah that leh a thar tam kawngah apui in a tangkai hle a ni. - Thlai bul tih hnawm nan a polythene dum hman hian hnim to tur a veng a, thlai a thang chak a, a par hma tir a, a thar tam phah tir bawk a ni.
		Bacterial Wilt	- Natna vei te chu a zung chawp a pawh phawi a hal ral vek tur. - Thlai chin dan thlakkual (crop rotation) hmangin he natna hi a tih ziaawm theih a ni. - Phun atanga thla khat hnu ah Bordeaux mixture (1:1:100) hmanga lei tih hnawn hi he natna enkawl nan hian a tangkai in a sawt em em a ni.
Early cole crop	Par a chhuah hma	LAWNGTLAI SAIHA	Leichhung a boruak a luh that a zung alo that zawk theihnan hnim to pawhfai leh lei chawhphut thin



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	tur. - Bawr tha tak thar chhuah theih nan phunsawn a nih hnu atanga kar 4-5 thlang a bul chawhphut a lei tih thawl tur a ni. - Kar khat dan zel ah tui pek tur a ni. - A bawr (head) a keh chhiatloh nan a puitlin hun lai velin tui pek tamloh hram tur.
		N tlakchhamna	- He tlakchhamna hi neem cake @0.4kg/m² hmangin a enkawl dam theih a ni. - He natna hi a lo lan chuan 2 per cent urea hman tur.
		P tlakchhamna	- He tlakchhamna hi phosphorus based fertilizer @0.4kg/m² hmangin a enkawl dam theih a ni. - He natna hi a lo lan chuan 4 per cent DAP hman tur.
Capsicum	A chi kui hun	Poly house	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawh a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar
		LAWNGTLAI	- A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni. - A chi theh atanga ni 10-15 hnu ah tui litre khat ah 1% Bordeaux mixture emaw 2 g captan emaw 3 copper oxychloride emaw siam a a kuina hmun phuh hnawn tur.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Purunsen	A chi kui hun	Poly house	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawh a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar
	MAMIT	KOLASIB AIZAWL CHAMPAI	- A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni. - A chi theh atanga ni 10-15 hnu ah tui litre khat ah 1% Bordeaux mixture emaw 2 g captan emaw 3 copper oxychloride emaw siam a a kuina hmun phuh hnawn tur.
French Bean	A chi theh hun	SERCHHIP LUNGLEI	- A chi danglam leh hrisel, chang tha leh thianghlim chiah theh tur. - Thing ngul hmang chi tan a chi theh inkar tur chu 60cm x 60 cm a ni. - A chi theh hma in a chi chu hectare khat ah Rhizobium vermicompost 10t hmang a enkawl tur a ni.
Sawhthing leh Aieng	Par a chhuah hma	LAWNGTLAI SAIHA	- Thlai hnah, a tang ro leh hnim te chu paihfai vek tur. - Lin tirh (a to chhuah hma) in Atrazine (Atratraf 50wp, Gesaprim 500fw) 1.0-1.5kg a.i tui litre 600 ah pawlh tur a ni. Alachlor (Lasso) @2.25kga.i ha⁻¹ Metolachlor (Dual) @1.5-2.0 kg a.i ha⁻¹, Pendimethalin (Stomp)



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			@ 1-1.5kg a.i ha ⁻¹ te hian hnimhnah lian lampang chi a veng a ni.
		Turmeric shoot borer (Aieng kung ei chhetu rannung) KOLASIB	✚ Rannung hlo imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1.0g emaw dimethoate 2ml emaw tui litre khatah pawlh a, hman tur a ni.
Kharif rice	A puitling hun/a vui insiam tan hun	MAMIT AIZAWL CHAMPAI	✚ A rawng chu a hring atangin gold rawngah a inthlak ang. ✚ Tui tling luan chhuahna tur mumal tak a sir kil khatah siam tur. ✚ A vui hmasa te tana harsatna awmlo tur in tui tling te chu paih chhuah vek tur.
		Sazu tihchhiat SERCHHIP LUNGLEI	✚ Sazu chhenna hmun tihchhiat leh fai taka buh hmun enkawl zir. ✚ Buh hmun leh achheh vel a awmhmun an khuar theihna tur atana hmanraw remchang hnimhnah leh thlai ningnawi emaw buh bangnawi awmthei hrim hrim chu thenfai vek tur. ✚ Sazu in a a tihchhiat nasatna hmun ah chuan sazu hrai na tur 2 per cent Zinc phosphide (96 parts of broken rice + 2 parts of edible oil + 2 parts of 98% ZnP) hman tur a ni. ZNP tur (poison) hman hma in a thlem dan tur zir a enchhin hmasak phot tur a ni.
		Sava tihchhiat LAWNGTLAI SAIHA	✚ Meithal chi hrim hrim eng pek chhuah pah a bengchheng siam thei hmanrua ✚ Balloon hampuar buh kunga tawnbeh hi sava hnawhbo nan senso hautaklo si a hman thin a ni.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			Lekhachhaih hi sava hlahu atan hman thin a ni bawk.
		Rice yellow stem borer KOLASIB	- A hnah hmawr tan tur. - A kung hrisel lo lai paih tur - Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu tui chu kah tur.
Vawk	Kumtluanin	Vawk natna	Vawkin heng natna chi hrang hrang nguina, che tha theilo, ek tang emaw kawthalo ang chi an lan tir a nih chuan ran doctor pan a rawn vat tur.
		Porcine Reproductive Respiratory Syndrome (PRRS). MAMIT	1. A natna vei vawk te chu thah a phum tur a ni.
	A puitling hun	Swine fever.	2. Vawk thla hnih a nihin SF vaccine pek tur a ni a, he vaccine hi thla ruk emaw kumtluanin pek chhunzawm tur
Bawng	Kumtluanin	Foot and Mouth Disease (FMD)	Thla16 a upa an rih in FMD vaccine pek tur a nia, thla 6 danah pek chhunzawm tur a ni.
	A naupan lai	Black Quarter (BQ)	- Black Quarter Vaccine (BQ) - Thla ruk an tlin hunah vaccine lak tan tur. - Kumkhat hnu ah vaccine pek leh tur.
Ar	Ar ek enkawl dan		- Atui awpna in ah eng darkar 12-14 tal a in chhi tur a ni. - An ekna tur hmun chu cm 7.5 – 10 inkar vel a chhah tur a ni. - Thingzei nawi emaw buhpawl emaw badam kawr emaw tehi an ekna tur atan a phah theih a ni. - Heng buhpawl, thingzei nawi te hi hnawng reng a vawn theih nan chinai phul tur a ni.
	Natna thlengthei enkawl lawk dan	0-3 rd week	Ranikhet Disease- Ar note an pian hlimin F₁ vaccine pek tur a



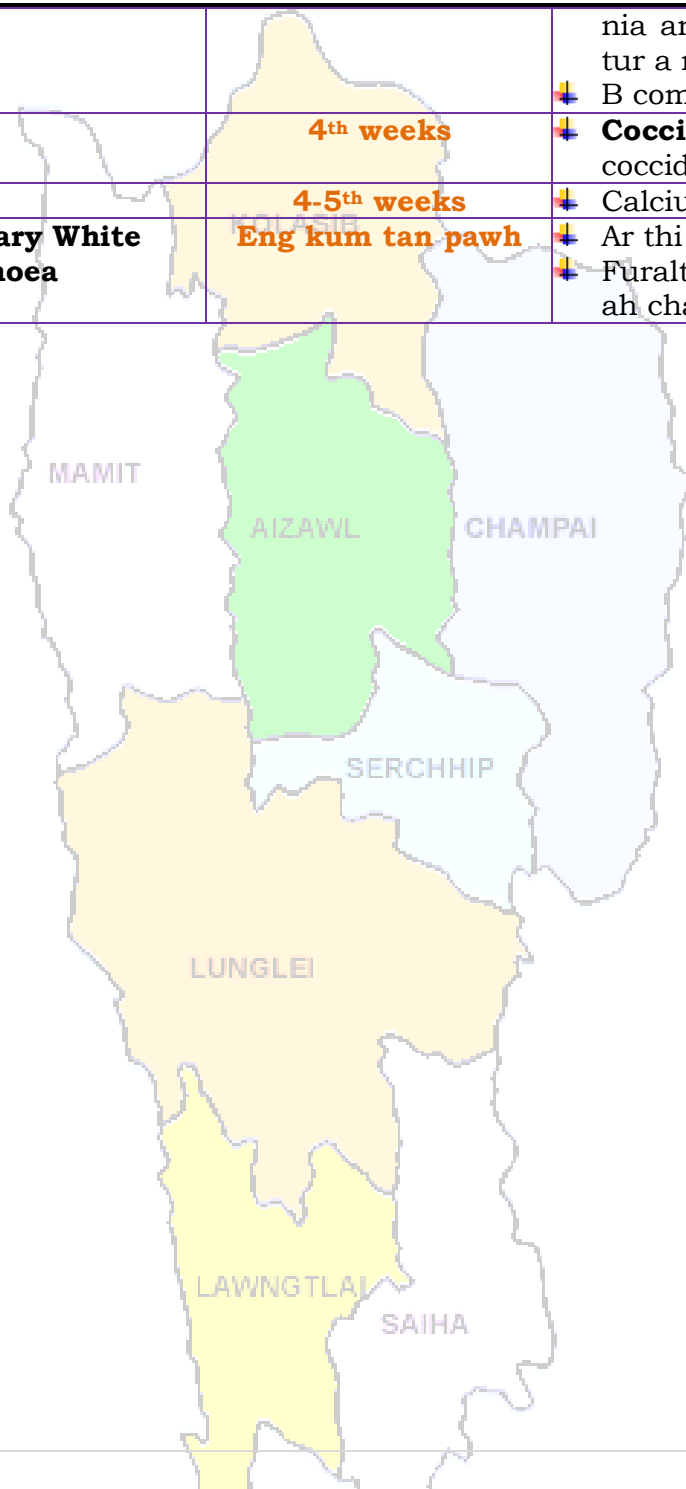
GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			nia an puitlin hunah R ₂ B pek leh tur a ni.
		4 th weeks	B complex leh antibodies
		4-5 th weeks	Coccidiosis - Amprolium emaw coccidiostat pek tur.
	Bacillary White Diarrhoea	Eng kum tan pawh	Calcium tonic leh B ₁₂
			Ar thi zawng zawng hal ral vak tur
			Furaltadone 0.5g chu tui litre khat ah chawhpawlh a hman tur.





GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratanplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr Y. Ramakrishna	:	Farm manager (T-6)	ramakrishnaiari@rediffmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Dr. Lalmuanzovi	:	PC KVK Lunglei	kvklunglei@gmail.com kvknahtial@gmail.com
Mr. C. Lalthlamuana	:	PC KVK, Kolasib	kvkkolasib@gmail.com
Mrs. Lalnunpui Parte	:	PC KVK, Serchhip	Mmami997@yahoo.com kvkserchhip@gmail.com
Ms. Lalrinawnri Renthlei	:	PC KVK, Champhai	pckvkkhawzawl@rediffmail.com
Mr. Lalrosanga Khiantge	:	PC KVK, Lawngtlai	vvl9@rediffmail.com kvklawngtalai@rediffmail.com
Ms. C. Racheal	:	PC KVK, Saiha	kvksaiha@gmail.com rachoza@gmail.com
Mr. Vanlalhruaia Hnamte	:	PC KVK, Mamit	kvkmamit@yahoo.in
Dr. K. P. Chaudhary	:	PC KVK, Aizawl	Kpchy@rediffmail.com kvkaizawl@rediffmail.com



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Serchhip

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/English

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	27	26	26	27	27
Min Temp (°C)	10	10	11	11	12
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Mainly clear
Max RH (%)	100	100	100	100	100
Min RH (%)	28	24	31	33	51
Wind Speed (Kmph)	4	4	4	4	4
*Wind Direction	E	E	E	E	E

Northerly- **N**, North-Easterly- **N-E**, Easterly- **E**, South-Easterly- **S-E**, Southerly- **S**, South-Westerly- **S-W**, Westerly- **W**, North-westerly- **N-W**.

STATUS OF MONSOON- June 1-30, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 384.87mm (430.2mm)	Champhai- 105.48mm (359.89mm)	Saiha- 307.40 mm (507.7mm)	Kolasib- 236.00mm (428.1mm)
Lawngtlai-291.20mm (453.1mm)	Lunglei-326.00mm (465.14mm)	Mamit-204.87mm (442.80mm)	Serchhip-411.72mm (259.62mm)

Weather summary of the past three days

Maximum Tem. (°C):22-24°C
Minimum Tem. (°C): 9-12°C
Maximum RH (%):78-89%
Minimum RH (%):27-43%
Wind Direction: Easterly
Cloud cover: Clear Sky
Wind speed: 2 km/hr

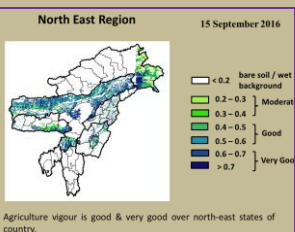
Rainfall: 00.0 mm

Weather forecast valid from 14th December, 2016 To 18th December, 2016.

There is no chance of rainfall during the next 5 days. The maximum and minimum temperatures for the next 5 days may range for 26-27°C and 10-12°C. Maximum relative humidity is expected in the range of 100% and minimum may from 24-51%. Wind direction would be easterly with the wind speed of 4 km per hour. Partially clear sky will prevail during the next five days.

Weekly cumulative rainfall: 00.0 mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Main Crop / Animal / Fisheries	Stage	Cultural practices/ Pest/ Diseases	Agricultural / Horticultural/ animal husbandry advisories
Khasi Mandarin and acid lime	Harvesting stage	KOLASIB MAMIT AIZAWL	- Orange is picked when colour turn to dark green to pale yellow. - Mandarins and sweet oranges normally take 240-280 days to arrive at maturity. - Mature fruits at colour break stage are picked up in 2 - 3 intervals of 10-15 days. - Limes and lemons take 150-160 days for maturity. - There may be 2 or 3 crops in a year in limes and lemons. - The cold storage conditions for long term storage for different citrus fruits are available. - Oranges may be packed in well ventilated CFB boxes - 30 cm x 30 cm x 30 cm.
		Fruit fly	In large gardens apply carbaryl 0.2 per cent or malathion 0.15 per cent suspension containing sugar or jeggery at 10 g/l at fortnightly intervals at flowering and fruit initiation.
Banana	Harvesting stage	LUNGLEI LAWNGTLAI SAITAI	- Change of colour from green to yellowish. - Fingers are about three quarters full i.e. 3/4 of fruit is rounded - Ridges should still be prominent on the remaining quarter of the finger. - Harvest bananas when they are swollen and green but before they become ripe (plump and yellow). - Too early (when the bananas are thin and dark green). - Too late (when they are thick and turning yellow).
		Banana Rhizome weevil	Apply insecticide like imidacloprid 0.5 ml or phosolone 1.5 ml or acephate 1.0 g or dimethoate 2 ml /l at 50% egg hatching



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			stage when 1 st instars predominate which coincides with I Fortnight of July.
		Banana panama wilt	✚ Use disease free planting material. Roughing of infected plant and destroy them. Removing of excess male buds prevent disease spread. Disinfect the farm equipments.
		Banana beetle	✚ Removal of weeds from basin ✚ Removal of unwanted sucker ✚ Application of alphamethrin @ 0.01%.
Oil plam	Harvesting stage	AIZAWL	✚ Harvest only ripe fruit bunches and collect all loose fruit using high quality harvesting equipment. ✚ The oilplam will be ready for harvest ready for harvesting in 2.5 to 3 years after the plantation in the main field. ✚ Harvesting can be done when the fruit on plam turns into yellowish to orange colour. ✚ While harvesting a stalk length of 5 cm alone should be left. Harvesting should be done at 10-12 days interval. ✚ In young plantations, we get more bunches with less bunch weight and in adult plantations the bunch weight is more but the bunch number is less.
Tomato	Blight disease	LUNGLEI	✚ Prevailing weather may conducive for blight in Tomato. ✚ Cloudy and humid weather is most favorable for the disease. ✚ To manage the blight in tomato apply Ridomil or Indofil or Mancozeb @ 2 gm per liter of water.
Potato	Sowing stage	LAWNGTLAI	✚ Prepare the land for potato cultivation without any further delay. ✚ This may help to avoid some bacterial infection at growing stage. ✚ Land may be ploughed thoroughly for proper tillage. ✚ Seed must be treated before sowing. ✚ Light irrigation on every alternate day may be given for better establishment



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Early Cole crop	Black spot disease	KOLASIB	and smooth growth. - Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Prevailing weather may conducive for black spot disease in Cole Crops. - To manage the attack in leafy vegetables and Cole crops, Mancozeb @ 2gm per liter of water may be sprayed.
		MAMIT	
		Cutworm AIZAWL	- Prevailing weather is conducive for the attack of cut worm which hide during day time in cracks of the soil and become active at dusk, feed on leave and cut the tender stem. - Apply cypermethrin or carbaryl 2 ml/lt of water or Tricel 1 ml/lt of water in evening every 10 days interval.
Onion	Nursery stage	Poly house LUNGLEI	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Spray Pendimethalin @ 3.5ml/lt of water in nursery which will give effective control of weed.
			- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
French bean	Sowing stage	LAWNGTLAI SAIHA	- Variable, healthy, well mature and pure seeds should be sown. - Optimum spacing for pole type 60 cm X 30 cm. - Before sowing seed should be treated with Rhizobium vermicompost@10 t/ha.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Capsicum	Nursery stage	Poly house	✚ Raised bed, nursery bed solarisation. ✚ Bed should be 1m width and conventional length. ✚ Application of FYM (1.5-2.0 kg/ m²) ✚ Line sowing of seeds (7-10cm)
		KOLASIB	✚ Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed ✚ Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
Carrot and radish		MAMIT AIZAWL SERCHHIP LUNGLEI	✚ Carrots and radish are sown in raised beds having dimension of 1 metre breadth, any convenient length and raised from 15 to 30 cms. ✚ In order to have an evenly sown crop the seeds are mixed with dry/ loose soil. ✚ In this method the seeds are sown in lines with the help of a marker at a distance of 6 cms apart. ✚ The seeds are then covered with loose and friable soil of about 2-4 cms again depending upon the rainfall and season. ✚ 90: 250: 130 Kg NPK will apply throughout the cropping season where whole quantity of Single Super Phosphate, Muriate of Potash and half the quantity of Urea is to be given as basal dose at the time of final preparation of the land.
Ginger and turmeric	Maturity stage	LAWNGTLAI SAIHA	✚ Field must be inspected daily for disease appearance. ✚ While inspecting, the healthy plants/plots must be marked and kept for planting in the next season. ✚ Marking has to be done properly otherwise when plant matures and gets dried up, it will be very difficult to find out the marked plots.
Zero tillage	Sowing stage		✚ After harvesting of rice, pea and lentil



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



pea and lentil cultivation in rice fellow			will sow under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the rabi crops pea and lentil. - Pea and lentil will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 30 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of lentil seeds and covered the seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Zero tillage toria cultivation in rice fellow	Sowing stage		- After harvesting of rice, toria under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the toria crops. - Toria crop will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 50 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of toria seeds. Half dose of nitrogen fertilizer along with full dose of phosphorus and potash will apply at the time of sowing. - Seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Soybean	Pod formation stage	Zero tillage	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Earthing up soil near to plant for better support.
Green gram, black gram and French bean	Vegetative stage	Zero tillage	- Clear base of the plant. - Earthing up soil near to plant for better support. - For French bean use bamboo for



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



(After Pre kharif rice harvest)			staking or support. ✚ Use split dose of fertilizer for better fruiting for French bean.
Rabi Maize	Sowing stage		✚ Prepare the land for maize cultivation without any further delay. ✚ This may help to avoid some cob borer infestation. ✚ Seed is being placed in furrows. ✚ Seed should be treated with Thiram @4 g/kg seed. ✚ Use optimum seed rate (20-25 kg/ha) for desire plant population. ✚ Apply well decomposed FYM @ 5-10 t/ha along with 80:60:40 kg N, P₂O₅ and K₂O/ha incorporate with soil before sowing. Half nitrogen dose will use at the time of sowing and remaining 25% after one month and 25% at flowering stage.
Pig	All stages		✚ As the weather gets colder, your pigs' energy requirement will increase, as they need more energy to keep warm. ✚ Regularly monitor their level of 'fitness' and increase their feed intake to maintain. ✚ Fish oils are excellent for providing slow-release energy with the added advantage of a high level of omega-3.
		Porcine Reproductive Respiratory Syndrome (PRRS).	1. Culling of positive pigs or piglets.
	Adult stage	Swine fever.	2. Vaccination of pigs with SF vaccines at 2 months and yearly interval/6 month interval
Cattle	All age group		• Due to prolong dry spell there is a shortage of green grass in the field. For balanced diet and nutrition to your cattle, provide urea molasses



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			treated paddy straw.
	All age group	Foot and Mouth Disease (FMD)	FMD vaccine at 16 week and repeat every 6 month.
	Young stage	Black Quarter (BQ)	- Black Quarter Vaccine (BQV). ❖ Primary vaccination 6 month or above ❖ Revaccination annually
Poultry	Litter management		- Birds require adequate space, sufficient feed to meet their nutritional requirements and an adequate supply of good-quality water. - Good management and sanitation are the best ways to avoid infectious disease in poultry. - Provide ample quantity of clean drinking water. - Avoid feeding of mouldy feed. Don't make sudden changes in feed
	Preventive measures	0-3rd week	Ranikhet Disease- F1 vaccine at (1-6) days of birth and R₂B vaccine for adult birds. - B complex with antibodies
		4th weeks	Coccidiosis- Amprolium or coccidiostat
		4-5th Weeks	Calcium tonic fortified with B₁₂



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratantplantpatho@gmail.com
Dr. L. H. Puii	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr. M. Thoithoi Devi	:	Scientist (Agronomy)	thoiagri@gmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Name of the KVK	Programme Coordinator Name and Designation	KVK Email Id	Phone no/ Mobile no
KVK Lunglei	Dr. Lalmuanzovi Head & Sr. Scientist	kvkhnahthial@gmail.com	9862803750 9436154614
KVK, Kolasib	Mr. Lalrosamga Khiangte Head & Sr. Scientist	kvkkolasib@gmail.com	9436152440
KVK, Serchhip	Mr. K. Laltlanmawia Head & Sr. Scientist	kvkserchhip@gmail.com	9436146115 9615389293
KVK, Champhai	Mrs. Lalrinawmi Renthlei Head & Sr. Scientist	kvkchawzawl@gmail.com	9436159788
KVK, Lawngtlai	Dr. Michel Lallawmkimi Head & Sr. Scientist	kvklawntlai@gmail.com	9436155858
KVK, Saiha	Dr. Vanlalhruaia Hnampe Head & Sr. Scientist	kvksaiha@gmail.com	8974656509
KVK, Mamit	Dr. Samuel Lalliansanga Head & Sr. Scientist	kvkmamit@gmail.com	9436147625
KVK, Aizawl	Dr. K. P. Chaudhary Head & Sr. Scientist	Kpchy@rediffmail.com kvkaizawl@rediffmail.com	9436351669



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Serchhip

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/Mizo

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	27	26	26	27	27
Min Temp (°C)	10	10	11	11	12
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Mainly clear
Max RH (%)	100	100	100	100	100
Min RH (%)	28	24	31	33	51
Wind Speed (Kmph)	4	4	4	4	4
*Wind Direction	E	E	E	E	E

Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E, Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.

STATUS OF MONSOON- May 1-31, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 383.68mm (341.8mm)	Champhai- 239.49mm (250.30mm)	Saiha- 109.52 mm (87.2mm)	Kolasib- 352.38mm (380.9mm)
Lawngtlai-321.51mm (285.5mm)	Lunglei-344.00mm (186.21mm)	Mamit-449.48mm (442.80mm)	Serchhip-411.72mm (259.63mm)

Ni thum kalta sik leh sa dinhmun tlangpui

**14th December– 18th December, 2016
chhunga sik leh sa dinhmun tur tlangpui**

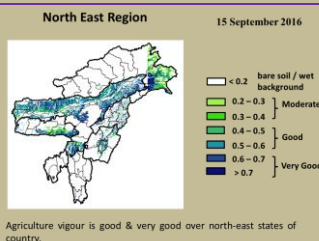
Maximum Tem. (°C):22-24°C
Minimum Tem. (°C): 9-12°C
Maximum RH (%):78-89%
Minimum RH (%):27-43%
Wind Direction: Easterly
Cloud cover: Clear Sky
Wind speed: 2 km/hr

Tun ni 5 chhung lo awm turah hian ruahtui tla miahlo tura beisei a ni. Khua a lum lai berin 26-27°C a ni ang a. A vawh lai ber in 10-12°C ni tura beisei a ni. RH san lai berin 100% leh a hniam lai berin 24-51% ni tur a rin niin. Thli hi darkar khatah 4 km vela chakin chhaklam awi zawngin a tleh rin a ni. A tlangpuiin tun ni nga chhung hian khawthiang tak hmuh beisei a ni.

Rainfall: 00.0 mm

Weekly cumulative rainfall: 00.0mm

***/NDVI for Mizoram**



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Thlai/ ran /sangha	Spat zawng	Hmalakna tur/ rannung leh natna hrik awm thei te	Agricultural/Horticultural/ animal husbandry atana thurawn
Khasi Mandarin leh acid lime	Seng (Harvesting) hun		- Serthlum rah chu a hringduk atanga rawng eng dala arawn inthlak hunah lawh tur a ni. - Mandarins leh sweet oranges te hian an puitlin nan ni 240-280 vel an mamawh. - A rah puitling tawhin a hmin rawng a rawn chhuah tan hunah lawh tur a ni a, ni 10-15 inkar danah wawi 2- 3 lawh tur a ni - Limes leh lemons hian puitlin nan ni 150-160 an mamawh. - Limes leh lemons te hi kum khatah wawi 2 emaw wawi 3 emaw an rah thei. - Rei tak dahthat theihna tur vur bawm (cold storage)changtlung tak ser rah chi hrang hrang tan a awm hrang vek bawk a ni. - Ser rah te chu boruak thianghlim luh theihna tur bawm (CFB Box) 30 cm x 30cm x 30 cm azau ah pack fel tur a ni.
		Ser rah bawmtu rannung thlawkthei (Fruitfly)	Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
Sapthei	Seng (Harvesting) hun		- A kung phun a nih atanga thla sawm hnu ah rah a pe chhuak tan a, chuan thla 16-18 a nih thlengin a rah chhunzawm ta thin a ni. - Rah hun bik hi tum hnih (2) a nei a chu chu August -



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			December leh March- May ah te an ni. - A rah hmin nan ni 80-85 vel a mamawh thin. - A rah rawn senduk (purple) toh chu a kuang tlem a zawng nen lawh tel tur a ni. - A rah seng tawh ho chu a pian hmang leh rihna te a tlakhniam hma in a rang lam a hralh zawh vat tur a ni. - A ro hnu in a kor te chu zur angin lang mahse a chhung lam erawh ni engemaw chen chu ala tha vek thung ang. - A kung a natna nei te chu lakkhawm a hal ral vek tur. - Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
		Sapthei rah bawmtu rannung thlawkthei (Fruitfly)	
Balhla	Seng (Harvesting) hun	Balhla zung eichhetu rannung (Banana Rhizome)	- A hring atanga a eng a a inthlak hunah . - A thlar a balhla ho hmun li a then a hmun thum an pum that a a bak zawngin kil anla neih lain. - Balhla hi anla puam a an hrin that lai mahse an hmin hma si in. - Balhla te an sin lai leh rawng hring duk anla nih lai chuan sengloh tur a ni. - Rawng eng an nih tawh chuan seng nan a tlai tawh tihna a ni. - Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		weevil)	tui chu rannung tui 50 per cent a keu hun velah kah tur a ni (July kar hmasa ber a ni tlangpui).
		Banana panama wilt	Natna kai lo chauh phun tur. Natna kai ho chu a zung nen kara paih tur. Farm-a hmanraw hrang hrangte natna hrik kai lo tura tihfai thin bawk tur a ni.
		Banana beetle	A bul vela hnim to tihfai tur A no rawn chawr thar mamawh loh te paih tur Alphamethrin 0.01 per cent hman tur
Oil palm	A rah insiam tan hunlai	AIZAWL CHAMPA SERCHHIP	A nu leh pa par hma lutuk te thenfai tur Heihian a kung a ti thag tha in zung a kaih ngheh tir bik thin a ni. Phun atanga thla 14-18 velah an par tlangpui A par nu leh pa hi a kung in vui a rawn chhuah tan tirh ah pawh phawi vat tur anni. Kut in emaw a pawhphawina hmanrua DOPR in ansiam hmangin awlsam takin a tih theih a ni. Hetiang a par nu leh pa lak hi kum hnih leh chanve atanga kum thum annih vel thlengin a tih zawm theih a ni.
		LUNGLEI LAWNGTLAI SAIHA	Thli leh rannung ten inthlahchhawanna kawngah an pui thin a, amaherawhchu thli hmanga inthlahchhawanna erawh hichuan a thawh hlawklo. Inthlahchhawn nan a rannung tangkai tak <i>Elaeidobius kamerunicus</i> hian a inthlahchhawanna ah leh a rah tur insiam kawngah a pui nasa hle a ni. Phun anih atanga kum hnih leh chanve hnu ah he rannung hi chhuah a tha a, kum thum hnu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			a a kung in a that puiloh anih chuan he rannung hi chhuah vek tur a ni.
Colocasia	A seng hun	KOLASIB	- A hnah te a eng (yellow) tan in a then an tla tan bawk a, chu chuan seng a hun a ni tih a lan tir. - Phun atanga thla 6-8 liam hnu ah seng theih a ni. - Seng dawnin uluk takin a zung nen phawi chhuah vek tur a ni. - Bal chu lahrangin ni hlimah pho hul tur a ni.
Tomato	A chi kui hun	A chi kuitiahna hmun tur siam dan	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawk a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar hlat zawng hi 7-10 cm tur a ni.
		Nursery natna (Damping off)	A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni.
Sawhthing leh Aieng	Par a chhuah hma	LAWNGTLAI SAIHA	- Thlai hnah, a tang ro leh hnim te chu paihfai vek tur. - Lin tirh (a to chhuah hma) in Atrazine (Atratraf 50wp, Gesaprim 500fw) 1.0-1.5kg a.i tui litre 600 ah pawlh tur a ni. Alachlor (Lasso) @2.25kga.i ha⁻¹ Metolachlor (Dual) @1.5-2.0 kg a.i ha⁻¹, Pendimethalin (Stomp) @ 1-1.5kg a.i ha⁻¹ te hian hnimhnah lian lampang chi a



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Turmeric shoot borer (Aieng kung ei chhetu ranning)	veng a ni. ✚ Ranning hlo imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1.0g emaw dimethoate 2ml emaw tui litre khatah pawlh a, hman tur a ni.
Kharif rice	A puitling hun/a vui insiam tan hun	KOLASIB	✚ A rawng chu a hring atangin gold rawngah a inthlak ang. ✚ Tui tling luan chhuahna tur mumal tak a sir kil khatah siam tur. ✚ A vui hmasa te tana harsatna awmlo tur in tui tling te chu paih chhuah vek tur.
		MAMIT	
		Sazu tihchhiat	✚ Sazu chhenna hmun tihchhiat leh fai taka buh hmun enkawl zir. ✚ Buh hmun leh achheh vel a awmhmun an khuar theihna tur atana hmanraw remchang hnimhnah leh thlai ningnawi emaw buh bangnawi awmthei hrim hrim chu thenfai vek tur. ✚ Sazu in a a tihchhiat nasatna hmun ah chuan sazu hrai na tur 2 per cent Zinc phosphide (96 parts of broken rice + 2 parts of edible oil + 2 parts of 98% ZnP) hman tur a ni. ZNP tur (poison) hman hma in a thlem dan tur zir a enchhin hmasak phot tur a ni.
		AIZAWL	
		CHAMPAI	
		SERCHHIP	
		LUNGLEI	
		Sava tihchhiat	✚ Meithal chi hrim hrim eng pek chhuah pah a bengchheng siam thei hmanrua ✚ Balloon hampuar buh kunga tawnbeh hi sava hnawhbo nan senso hautaklo si a hman thin a ni. ✚ Lekhachhaih hi sava hlauh atan hman thin a ni bawk.
		LAWNGTLAI	
		SAIHA	



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Rice yellow stem borer	- A hnah hmawr tan tur. - A kung hrisel lo lai paih tur - Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu tui chu kah tur.
Bekang	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut thin tur.
Green gram, black gram leh French bean (nipui buh seng zawh hunah)	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut rih vur thin tur. - French bean tan bik athlawp tu atan mau hman tur. - A rah athat lehzuall nan French bean tan bik chuan mumal takin a in henin leitha pek tur.
Vawk	Kumtluanin	Vawk natna	Vawkin heng natna chi hrang hrang nguina, che tha theilo, ek tang emaw kawthalo ang chi an lan tir a nih chuan ran doctor pan a rawn vat tur.
		Porcine Reproductive Respiratory Syndrome (PRRS).	1. A natna vei vawk te chu thah a phum tur a ni.
	A puitling hun	Swine fever.	2. Vawk thla hnih a nihin SF vaccine pek tur a ni a, he vaccine hi thla ruk emaw kumtluanin pek chhunzawm tur
Bawng	Kumtluanin	Foot and Mouth Disease (FMD)	Thla16 a upa an rih in FMD vaccine pek tur a nia, thla 6 danah pek chhunzawm tur a ni.
	A naupan lai	Black Quarter (BQ)	- Black Quarter Vaccine (BQ) - Thla ruk an tlin hunah vaccine lak tan tur. - Kumkhat hnu ah vaccine pek leh tur.
Ar	Ar ek enkawl dan		Atui awpna in ah eng darkar 12-



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	14 tal a in chhi tur a ni. • An ekna tur hmun chu cm 7.5 – 10 inkar vel a chhah tur a ni. • Thingzei nawi emaw buhpawl emaw badam kawr emaw tehi an ekna tur atan a phah theih a ni. • Heng buhpawl, thingzei nawi te hi hnawng reng a vawn theih nan chinai phul tur a ni.
	Natna thlengthei enkawl lawk dan	MAMIT	0-3rd week ✚ Ranikhet Disease- Ar note an pian hlimin F₁ vaccine pek tur a nia an puitlin hunah R₂B pek leh tur a ni. ✚ B complex leh antibodies
		AIZAWL	4th weeks ✚ Coccidiosis- Amprolium emaw coccidiostat pek tur.
		CHAMPAI	4-5th weeks ✚ Calcium tonic leh B₁₂
	Bacillary White Diarrhoea	Eng kum tan pawh	✚ Ar thi zawng zawng hal ral vak tur ✚ Furaldone 0.5g chu tui litre khat ah chawhpawlh a hman tur.
		SERCHHIP	
		LUNGLEI	
		LAWNGTLAI	
		SAIHA	



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratanplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr Y. Ramakrishna	:	Farm manager (T-6)	ramakrishnaiari@rediffmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Dr. Lalmuanzovi	:	PC KVK Lunglei	kvklunglei@gmail.com kvknahtial@gmail.com
Mr. C. Lalthlamuana	:	PC KVK, Kolasib	kvkkolasib@gmail.com
Mrs. Lalnunpui Parte	:	PC KVK, Serchhip	Mmami997@yahoo.com kvkserchhip@gmail.com
Ms. Lalrinawnri Renthlei	:	PC KVK, Champhai	pckvkkhawzawl@rediffmail.com
Mr. Lalrosanga Khiantge	:	PC KVK, Lawngtlai	vvl9@rediffmail.com kvklawngtalai@rediffmail.com
Ms. C. Racheal	:	PC KVK, Saiha	kvksaiha@gmail.com rachoza@gmail.com
Mr. Vanlalhruaia Hnamte	:	PC KVK, Mamit	kvkmamit@yahoo.in
Dr. K. P. Chaudhary	:	PC KVK, Aizawl	Kpchy@rediffmail.com kvkaizawl@rediffmail.com



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Aizawl

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/English

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	8	8	9	9	8
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	100	100	100	100	99
Min RH (%)	36	34	39	38	52
Wind Speed (Kmph)	3	3	3	3	2
*Wind Direction	E	E	E	E	E

Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E, Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.

STATUS OF MONSOON- June 1-30, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 384.87mm (430.2mm)	Champhai- 105.48mm (359.89mm)	Saiha- 307.40 mm (507.7mm)	Kolasib- 236.00mm (428.1mm)
Lawngtlai-291.20mm (453.1mm)	Lunglei-326.00mm (465.14mm)	Mamit-204.87mm (442.80mm)	Serchhip-411.72mm (259.62mm)

Weather summary of the past three days

Maximum Tem. (°C):22-24°C
Minimum Tem. (°C): 8-11°C
Maximum RH (%):78-86%
Minimum RH (%):43-69%
Wind Direction: Easterly
Cloud cover: Mainly cloudy
Wind speed: 2 km/hr

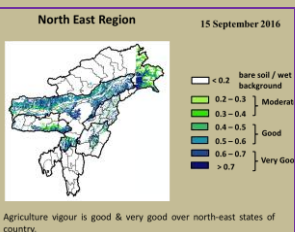
Rainfall: 00.0 mm

Weather forecast valid from 14th December, 2016 To 18th December, 2016.

There is no chance of rainfall during the next 5 days. The maximum and minimum temperatures for the next 5 days may range for 26-27°C and 8-9°C. Maximum relative humidity is expected in the range of 99-100% and minimum may from 34-52%. Wind direction would be easterly with the wind speed of 2-3 km per hour. Clear sky will prevail during the next five days.

Weekly cumulative rainfall: 00.0 mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Main Crop / Animal / Fisheries	Stage	Cultural practices/ Pest/ Diseases	Agricultural / Horticultural/ animal husbandry advisories
Khasi Mandarin and acid lime	Harvesting stage	KOLASIB MAMIT AIZAWL	- Orange is picked when colour turn to dark green to pale yellow. - Mandarins and sweet oranges normally take 240-280 days to arrive at maturity. - Mature fruits at colour break stage are picked up in 2 - 3 intervals of 10-15 days. - Limes and lemons take 150-160 days for maturity. - There may be 2 or 3 crops in a year in limes and lemons. - The cold storage conditions for long term storage for different citrus fruits are available. - Oranges may be packed in well ventilated CFB boxes - 30 cm x 30 cm x 30 cm.
		Fruit fly	In large gardens apply carbaryl 0.2 per cent or malathion 0.15 per cent suspension containing sugar or jeggery at 10 g/l at fortnightly intervals at flowering and fruit initiation.
Banana	Harvesting stage	LUNGLEI LAWNGTLAI SAITAI	- Change of colour from green to yellowish. - Fingers are about three quarters full i.e. 3/4 of fruit is rounded - Ridges should still be prominent on the remaining quarter of the finger. - Harvest bananas when they are swollen and green but before they become ripe (plump and yellow). - Too early (when the bananas are thin and dark green). - Too late (when they are thick and turning yellow).
		Banana Rhizome weevil	Apply insecticide like imidacloprid 0.5 ml or phosolone 1.5 ml or acephate 1.0 g or dimethoate 2 ml /l at 50% egg hatching



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			stage when 1 st instars predominate which coincides with I Fortnight of July.
		Banana panama wilt	Use disease free planting material. Roughing of infected plant and destroy them. Removing of excess male buds prevent disease spread. Disinfect the farm equipments.
Oil plam	Harvesting stage	Banana panama wilt	- Harvest only ripe fruit bunches and collect all loose fruit using high quality harvesting equipment. - The oilplam will be ready for harvest ready for harvesting in 2.5 to 3 years after the plantation in the main field. - Harvesting can be done when the fruit on plam turns into yellowish to orange colour. - While harvesting a stalk length of 5 cm alone should be left. Harvesting should be done at 10-12 days interval. - In young plantations, we get more bunches with less bunch weight and in adult plantations the bunch weight is more but the bunch number is less.
Tomato	Blight disease	Banana panama wilt	- Prevailing weather may conducive for blight in Tomato. - Cloudy and humid weather is most favorable for the disease. - To manage the blight in tomato apply Ridomil or Indofil or Mancozeb @ 2 gm per liter of water.
Potato	Sowing stage	Banana panama wilt	- Prepare the land for potato cultivation without any further delay. - This may help to avoid some bacterial infection at growing stage. - Land may be ploughed thoroughly for proper tillage. - Seed must be treated before sowing. - Light irrigation on every alternate day may be given for better establishment and smooth growth.
Early Cole crop	Black spot disease	Banana panama wilt	Light irrigation on every alternate day may be given for better establishment



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	- and smooth growth. - Mulching must be done after irrigation. - Prevailing weather may conducive for black spot disease in Cole Crops. - To manage the attack in leafy vegetables and Cole crops, Mancozeb @ 2gm per liter of water may be sprayed.
		MAMIT Cutworm AIZAWL	- Prevailing weather is conducive for the attack of cut worm which hide during day time in cracks of the soil and become active at dusk, feed on leave and cut the tender stem. - Apply cypermethrin or carbaryl 2 ml/lt of water or Tricel 1 ml/lt of water in evening every 10 days interval.
Onion	Nursery stage	Poly house SERCHHIP	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Spray Pendimethalin @ 3.5ml/lt of water in nursery which will give effective control of weed.
		LUNGLEI	- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
French bean	Sowing stage	LAWNGTLAI SAIHA	- Variable, healthy, well mature and pure seeds should be sown. - Optimum spacing for pole type 60 cm X 30 cm. - Before sowing seed should be treated with Rhizobium vermicompost@10 t/ha.
Capsicum	Nursery stage	Poly house	- Raised bed, nursery bed solarisation. - Bed should be 1m width and conventional length.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			- Application of FYM (1.5-2.0 kg/ m²) - Line sowing of seeds (7-10cm)
		KOLASIB	- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
Carrot and radish	Sowing stage	MAMIT AIZAWL SERCHHIP LUNGLEI	- Carrots and radish are sown in raised beds having dimension of 1 metre breadth, any convenient length and raised from 15 to 30 cms. - In order to have an evenly sown crop the seeds are mixed with dry/ loose soil. - In this method the seeds are sown in lines with the help of a marker at a distance of 6 cms apart. - The seeds are then covered with loose and friable soil of about 2-4 cms again depending upon the rainfall and season. 90: 250: 130 Kg NPK will apply throughout the cropping season where whole quantity of Single Super Phosphate, Muriate of Potash and half the quantity of Urea is to be given as basal dose at the time of final preparation of the land.
Ginger and turmeric	Maturity stage	LAWNGTLAI SAIHA	- Field must be inspected daily for disease appearance. - While inspecting, the healthy plants/plots must be marked and kept for planting in the next season. - Marking has to be done properly otherwise when plant matures and gets dried up, it will be very difficult to find out the marked plots.
Zero tillage pea and lentil cultivation in	Sowing stage		- After harvesting of rice, pea and lentil will sow under no-till system. - The rice fields will drain at physiological maturity (one week before



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



rice fellow		KOLASIB	harvesting) to get a suitable soil condition to cultivate the rabi crops pea and lentil. - Pea and lentil will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 30 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of lentil seeds and covered the seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Zero tillage toria cultivation in rice fellow	Sowing stage MAMIT	AIZAWL CHAMPAL SERCHHIP LUNGLEI	- After harvesting of rice, toria under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the toria crops. - Toria crop will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 50 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of toria seeds. Half dose of nitrogen fertilizer along with full dose of phosphorus and potash will apply at the time of sowing. - Seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Soybean	Pod formation stage	Zero tillage	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Earthing up soil near to plant for better support.
Green gram, black gram and French bean (After Pre kharif rice harvest)	Vegetative stage	Zero tillage LAWNGTLAI SAIHA	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Earthing up soil near to plant for better support. - For French bean use bamboo for staking or support.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			Use split dose of fertilizer for better fruiting for French bean.
Rabi Maize	Sowing stage		- Prepare the land for maize cultivation without any further delay. - This may help to avoid some cob borer infestation. - Seed is being placed in furrows. - Seed should be treated with Thiram @4 g/kg seed. - Use optimum seed rate (20-25 kg/ha) for desire plant population. - Apply well decomposed FYM @ 5-10 t/ha along with 80:60:40 kg N, P₂O₅ and K₂O/ha incorporate with soil before sowing. Half nitrogen dose will use at the time of sowing and remaining 25% after one month and 25% at flowering stage.
Pig	All stages		- As the weather gets colder, your pigs' energy requirement will increase, as they need more energy to keep warm. - Regularly monitor their level of 'fitness' and increase their feed intake to maintain. - Fish oils are excellent for providing slow-release energy with the added advantage of a high level of omega-3.
		Porcine Reproductive Respiratory Syndrome (PRRS).	1. Culling of positive pigs or piglets.
	Adult stage	Swine fever.	2. Vaccination of pigs with SF vaccines at 2 months and yearly interval/6 month interval
Cattle	All age group		Due to prolong dry spell there is a shortage of green grass in the field. For balanced diet and nutrition to your cattle, provide urea molasses treated paddy straw.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



	All age group	Foot and Mouth Disease (FMD)	FMD vaccine at 16 week and repeat every 6 month.
	Young stage	Black Quarter (BQ)	- Black Quarter Vaccine (BQV). ❖ Primary vaccination 6 month or above ❖ Revaccination annually
Poultry	Litter management	KOLASIB MAMIT AIZAWL CHAMPHAI	✚ Birds require adequate space, sufficient feed to meet their nutritional requirements and an adequate supply of good-quality water. ✚ Good management and sanitation are the best ways to avoid infectious disease in poultry. ✚ Provide ample quantity of clean drinking water. ✚ Avoid feeding of mouldy feed. Don't make sudden changes in feed
	Preventive measures	0-3 rd week	✚ Ranikhet Disease- F1 vaccine at (1-6) days of birth and R₂B vaccine for adult birds. ✚ B complex with antibodies
		4 th weeks	✚ Coccidiosis- Amprolium or coccidiostat
		4-5 th Weeks	✚ Calcium tonic fortified with B₁₂





GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratantplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr. M. Thoithoi Devi	:	Scientist (Agronomy)	thoiagri@gmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Name of the KVK	Programme Coordinator Name and Designation	KVK Email Id	Phone no/ Mobile no
KVK Lunglei	Dr. Lalmuanzovi Head & Sr. Scientist	kvkhnahthial@gmail.com	9862803750 9436154614
KVK, Kolasib	Mr. Lalrosamga Khiangte Head & Sr. Scientist	kvkkolasib@gmail.com	9436152440
KVK, Serchhip	Mr. K. Laltlanmawia Head & Sr. Scientist	kvkserchhip@gmail.com	9436146115 9615389293
KVK, Champhai	Mrs. Lalrinawmi Renthlei Head & Sr. Scientist	kvkchawzawl@gmail.com	9436159788
KVK, Lawngtlai	Dr. Michel Lallawmkimi Head & Sr. Scientist	kvklawntlai@gmail.com	9436155858
KVK, Saiha	Dr. Vanlalhruaia Hnampe Head & Sr. Scientist	kvksaiha@gmail.com	8974656509
KVK, Mamit	Dr. Samuel Lalliansanga Head & Sr. Scientist	kvkmamit@gmail.com	9436147625
KVK, Aizawl	Dr. K. P. Chaudhary Head & Sr. Scientist	Kpchy@rediffmail.com kvkaizawl@rediffmail.com	9436351669



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Aizawl

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/Mizo

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	8	8	9	9	8
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	100	100	100	100	99
Min RH (%)	36	34	39	38	52
Wind Speed (Kmph)	3	3	3	3	2
*Wind Direction	E	E	E	E	E

Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E, Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.

STATUS OF MONSOON- May 1-31, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 383.68mm (341.8mm)	Champhai- 239.49mm (250.30mm)	Saiha- 109.52 mm (87.2mm)	Kolasib- 352.38mm (380.9mm)
Lawngtlai-321.51mm (285.5mm)	Lunglei-344.00mm (186.21mm)	Mamit-449.48mm (442.80mm)	Serchhip-411.72mm (259.63mm)

Ni thum kalta sik leh sa dinhmun tlangpui

**14th December– 18th December, 2016
chhunga sik leh sa dinhmun tur tlangpui**

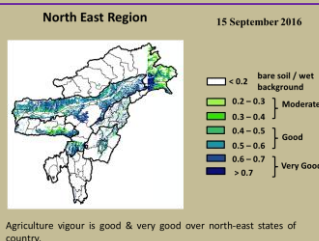
Maximum Tem. (°C):22-24°C
Minimum Tem. (°C): 8-11°C
Maximum RH (%):78-86%
Minimum RH (%):43-69%
Wind Direction: Easterly
Cloud cover: Mainly cloudy
Wind speed: 2 km/hr

Tun ni 5 chhung lo awm turah hian ruahtui tla miahlo tura beisei a ni. Khua a lum lai berin 26-27°C a ni ang a. A vawh lai ber in 8-9°C ni tura beisei a ni. RH san lai berin 99-100% leh a hniam lai berin 34-52% ni tur a rin niin. Thli hi darkar khatah 2-3 km vela chakin chhaklam awi zawngin a tleh rin a ni. A tlangpuiin tun ni nga chhung hian khawthiang tak hmuh beisei a ni.

Rainfall: 00.0 mm

Weekly cumulative rainfall: 00.0mm

***/NDVI for Mizoram**



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Thlai/ ran /sangha	Spat zawng	Hmalakna tur/ rannung leh natna hrik awm thei te	Agricultural/Horticultural/ animal husbandry atana thurawn
Khasi Mandarin leh acid lime	Seng (Harvesting) hun		- Serthlum rah chu a hringduk atanga rawng eng dala arawn inthlak hunah lawh tur a ni. - Mandarins leh sweet oranges te hian an puitlin nan ni 240-280 vel an mamawh. - A rah puitling tawhin a hmin rawng a rawn chhuah tan hunah lawh tur a ni a, ni 10-15 inkar danah wawi 2- 3 lawh tur a ni - Limes leh lemons hian puitlin nan ni 150-160 an mamawh. - Limes leh lemons te hi kum khatah wawi 2 emaw wawi 3 emaw an rah thei. - Rei tak dahthat theihna tur vur bawm (cold storage)changtlung tak ser rah chi hrang hrang tan a awm hrang vek bawk a ni. - Ser rah te chu boruak thianghlim luh theihna tur bawm (CFB Box) 30 cm x 30cm x 30 cm azau ah pack fel tur a ni.
		Ser rah bawmtu rannung thlawkthei (Fruitfly)	Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
Sapthei	Seng (Harvesting) hun		- A kung phun a nih atanga thla sawm hnu ah rah a pe chhuak tan a, chuan thla 16-18 a nih thlengin a rah chhunzawm ta thin a ni. - Rah hun bik hi tum hnih (2) a nei a chu chu August -



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			December leh March- May ah te an ni. - A rah hmin nan ni 80-85 vel a mamawh thin. - A rah rawn senduk (purple) toh chu a kuang tlem a zawng nen lawh tel tur a ni. - A rah seng tawh ho chu a pian hmang leh rihna te a tlakhniam hma in a rang lam a hralh zawh vat tur a ni. - A ro hnu in a kor te chu zur angin lang mahse a chhung lam erawh ni engemaw chen chu ala tha vek thung ang. - A kung a natna nei te chu lakkhawm a hal ral vek tur. - Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
		Sapthei rah bawmtu rannung thlawkthei (Fruitfly)	
Balhla	Seng (Harvesting) hun		- A hring atanga a eng a a inthlak hunah . - A thlar a balhla ho hmun li a then a hmun thum an pum that a a bak zawngin kil anla neih lain. - Balhla hi anla puam a an hrin that lai mahse an hmin hma si in. - Balhla te an sin lai leh rawng hring duk anla nih lai chuan sengloh tur a ni. - Rawng eng an nih tawh chuan seng nan a tlai tawh tihna a ni.
		Balhla zung eichhetu rannung (Banana Rhizome)	Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		weevil)	tui chu rannung tui 50 per cent a keu hun velah kah tur a ni (July kar hmasa ber a ni tlangpui).
		Banana panama wilt	✚ Natna kai lo chauh phun tur. Natna kai ho chu a zung nen kara paih tur. Farm-a hmanraw hrang hrangte natna hrik kai lo tura tihfai thin bawk tur a ni.
		Banana beetle	✚ A bul vela hnim to tihfai tur ✚ A no rawn chawr thar mamawh loh te paih tur ✚ Alphamethrin 0.01 per cent hman tur
Oil palm	A rah insiam tan hunlai	AIZAWL CHAMPA SERCHHIP	✚ A nu leh pa par hma lutuk te thenfai tur ✚ Heihian a kung a ti thag tha in zung a kaih ngheh tir bik thin a ni. Phun atanga thla 14-18 velah an par tlangpui ✚ A par nu leh pa hi a kung in vui a rawn chhuah tan tirh ah pawh phawi vat tur anni. ✚ Kut in emaw a pawhphawina hmanrua DOPR in ansiam hmangin awlsam takin a tih theih a ni. ✚ Hetianga a par nu leh pa lak hi kum hnih leh chanve atanga kum thum annih vel thlengin a tih zawm theih a ni.
		LUNGLEI LAWNGTLAI SAIHA	✚ Thli leh rannung ten inthlahchhawanna kawngah an pui thin a, amaherawhchu thli hmanga inthlahchhawanna erawh hichuan a thawh hlawklo. ✚ Inthlahchhawn nan a rannung tangkai tak <i>Elaeidobius kamerunicus</i> hian a inthlahchhawanna ah leh a rah tur insiam kawngah a pui nasa hle a ni. ✚ Phun anih atanga kum hnih leh chanve hnu ah he rannung hi chhuah a tha a, kum thum hnu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			a a kung in a that puiloh anih chuan he rannung hi chhuah vek tur a ni.
Colocasia	A seng hun	KOLASIB	- A hnah te a eng (yellow) tan in a then an tla tan bawk a, chu chuan seng a hun a ni tih a lan tir. - Phun atanga thla 6-8 liam hnu ah seng theih a ni. - Seng dawnin uluk takin a zung nen phawi chhuah vek tur a ni. - Bal chu lahrangin ni hlimah pho hul tur a ni.
Tomato	A chi kui hun	A chi kuitiahna hmun tur siam dan	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawk a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar hlat zawng hi 7-10 cm tur a ni.
		Nursery natna (Damping off)	A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni.
Sawhthing leh Aieng	Par a chhuah hma	LAWNGTLAI SAIHA	- Thlai hnah, a tang ro leh hnim te chu paihfai vek tur. - Lin tirh (a to chhuah hma) in Atrazine (Atratraf 50wp, Gesaprim 500fw) 1.0-1.5kg a.i tui litre 600 ah pawlh tur a ni. Alachlor (Lasso) @2.25kga.i ha⁻¹ Metolachlor (Dual) @1.5-2.0 kg a.i ha⁻¹, Pendimethalin (Stomp) @ 1-1.5kg a.i ha⁻¹ te hian hnimhnah lian lampang chi a



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Turmeric shoot borer (Aieng kung ei chhetu ranning)	veng a ni. ✚ Ranning hlo imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1.0g emaw dimethoate 2ml emaw tui litre khatah pawlh a, hman tur a ni.
Kharif rice	A puitling hun/a vui insiam tan hun	KOLASIB	✚ A rawng chu a hring atangin gold rawngah a inthlak ang. ✚ Tui tling luan chhuahna tur mumal tak a sir kil khatah siam tur. ✚ A vui hmasa te tana harsatna awmlo tur in tui tling te chu paih chhuah vek tur.
		MAMIT	
		Sazu tihchhiat	✚ Sazu chhenna hmun tihchhiat leh fai taka buh hmun enkawl zir. ✚ Buh hmun leh achheh vel a awmhmun an khuar theihna tur atana hmanraw remchang hnimhna leh thlai ningnawi emaw buh bangnawi awmthei hrim hrim chu thenfai vek tur. ✚ Sazu in a a tihchhiat nasatna hmun ah chuan sazu hrai na tur 2 per cent Zinc phosphide (96 parts of broken rice + 2 parts of edible oil + 2 parts of 98% ZnP) hman tur a ni. ZNP tur (poison) hman hma in a thlem dan tur zir a enchhin hmasak phot tur a ni.
		AIZAWL	
		CHAMPAI	
		SERCHHIP	
		LUNGLEI	
		Sava tihchhiat	✚ Meithal chi hrim hrim eng pek chhuah pah a bengchheng siam thei hmanrua ✚ Balloon hampuar buh kunga tawnbeh hi sava hnawhbo nan senso hautaklo si a hman thin a ni. ✚ Lekhachhaih hi sava hlauh atan hman thin a ni bawk.
		LAWNGTLAI	
		SAIHA	



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Rice yellow stem borer	- A hnah hmawr tan tur. - A kung hrisel lo lai paih tur - Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu tui chu kah tur.
Bekang	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut thin tur.
Green gram, black gram leh French bean (nipui buh seng zawh hunah)	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut rih vur thin tur. - French bean tan bik athlawp tu atan mau hman tur. - A rah athat lehzuall nan French bean tan bik chuan mumal takin a in henin leitha pek tur.
Vawk	Kumtluanin	Vawk natna	Vawkin heng natna chi hrang hrang nguina, che tha theilo, ek tang emaw kawthalo ang chi an lan tir a nih chuan ran doctor pan a rawn vat tur.
		Porcine Reproductive Respiratory Syndrome (PRRS).	1. A natna vei vawk te chu thah a phum tur a ni.
	A puitling hun	Swine fever.	2. Vawk thla hnih a nihin SF vaccine pek tur a ni a, he vaccine hi thla ruk emaw kumtluanin pek chhunzawm tur
Bawng	Kumtluanin	Foot and Mouth Disease (FMD)	Thla16 a upa an rih in FMD vaccine pek tur a nia, thla 6 danah pek chhunzawm tur a ni.
	A naupan lai	Black Quarter (BQ)	- Black Quarter Vaccine (BQ) - Thla ruk an tlin hunah vaccine lak tan tur. - Kumkhat hnu ah vaccine pek leh tur.
Ar	Ar ek enkawl dan		Atui awpna in ah eng darkar 12-



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	14 tal a in chhi tur a ni. • An ekna tur hmun chu cm 7.5 – 10 inkar vel a chhah tur a ni. • Thingzei nawi emaw buhpawl emaw badam kawr emaw tehi an ekna tur atan a phah theih a ni. • Heng buhpawl, thingzei nawi te hi hnawng reng a vawn theih nan chinai phul tur a ni.
	Natna thlengthei enkawl lawk dan	MAMIT	0-3rd week ✚ Ranikhet Disease- Ar note an pian hlimin F₁ vaccine pek tur a nia an puitlin hunah R₂B pek leh tur a ni. ✚ B complex leh antibodies
		AIZAWL	4th weeks ✚ Coccidiosis- Amprolium emaw coccidiostat pek tur.
		CHAMPAI	4-5th weeks ✚ Calcium tonic leh B₁₂
	Bacillary White Diarrhoea	Eng kum tan pawh	✚ Ar thi zawng zawng hal ral vak tur ✚ Furaldone 0.5g chu tui litre khat ah chawhpawlh a hman tur.
		SERCHHIP	
		LUNGLEI	
		LAWNGTLAI	
		SAIHA	



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratanplantpatho@gmail.com
Dr. L. H. Puii	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr Y. Ramakrishna	:	Farm manager (T-6)	ramakrishnaiari@rediffmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Dr. Lalmuanzovi	:	PC KVK Lunglei	kvklunglei@gmail.com kvknahtial@gmail.com
Mr. C. Lalthlamuana	:	PC KVK, Kolasib	kvkkolasib@gmail.com
Mrs. Lalnunpui Parte	:	PC KVK, Serchhip	Mmami997@yahoo.com kvkserchhip@gmail.com
Ms. Lalrinawnri Renthlei	:	PC KVK, Champhai	pckvkkhawzawl@rediffmail.com
Mr. Lalrosanga Khiantge	:	PC KVK, Lawngtlai	vvl9@rediffmail.com kvklawngtalai@rediffmail.com
Ms. C. Racheal	:	PC KVK, Saiha	kvksaiha@gmail.com rachoza@gmail.com
Mr. Vanlalhruaia Hnamte	:	PC KVK, Mamit	kvkmamit@yahoo.in
Dr. K. P. Chaudhary	:	PC KVK, Aizawl	Kpchy@rediffmail.com kvkaizawl@rediffmail.com



GRAMIN KRISHI MAUSAM SEWA
ICAR RESEARCH COMPLEX FOR NEH REGION
 Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Champhai

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/English

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	10	10	11	10	11
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Mainly clear
Max RH (%)	99	100	99	99	99
Min RH (%)	37	35	40	40	52
Wind Speed (Kmph)	4	4	4	2	2
*Wind Direction	S-E	S-E	S-E	S-E	S-E

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
 Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- June 1-30, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 384.87mm (430.2mm)	Champhai- 105.48mm (359.89mm)	Saiha- 307.40 mm (507.7mm)	Kolasib- 236.00mm (428.1mm)
Lawngtlai-291.20mm (453.1mm)	Lunglei-326.00mm (465.14mm)	Mamit-204.87mm (442.80mm)	Serchhip-411.72mm (259.62mm)

Weather summary of the past three days

Maximum Tem. (°C): 19-21°C
Minimum Tem. (°C): 6-11°C
Maximum RH (%):75-86%
Minimum RH (%):35-54%
Wind Direction: Southeasterly
Cloud cover: Mainly cloudy
Wind Speed: 2km/hr

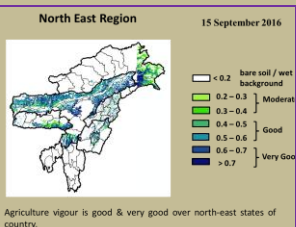
Rainfall: 00.0 mm

Weather forecast valid from 14th December, 2016 To 18th December, 2016.

There is no chance of rainfall during the next 5 days. The maximum and minimum temperatures for the next 5 days may range for 26-27°C and 10-11°C. Maximum relative humidity is expected in the range of 99-100% and minimum may from 35-52%. Wind direction would be southeasterly with the wind speed of 2-4 km per hour. Clear sky will prevail during the next five days.

Weekly cumulative rainfall: 00.0 mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions

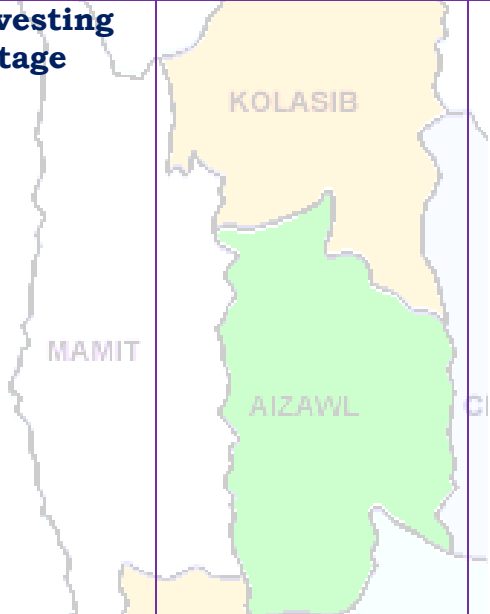


GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Main Crop / Animal / Fisheries	Stage	Cultural practices/ Pest/ Diseases	Agricultural / Horticultural/ animal husbandry advisories
Khasi Mandarin and acid lime	Harvesting stage		- Orange is picked when colour turn to dark green to pale yellow. - Mandarins and sweet oranges normally take 240-280 days to arrive at maturity. - Mature fruits at colour break stage are picked up in 2 - 3 intervals of 10-15 days. - Limes and lemons take 150-160 days for maturity. - There may be 2 or 3 crops in a year in limes and lemons. - The cold storage conditions for long term storage for different citrus fruits are available. - Oranges may be packed in well ventilated CFB boxes - 30 cm x 30 cm x 30 cm.
Oil plam	Harvesting stage		- Harvest only ripe fruit bunches and collect all loose fruit using high quality harvesting equipment. - The oilplam will be ready for harvest ready for harvesting in 2.5 to 3 years after the plantation in the main field. - Harvesting can be done when the fruit on plam turns into yellowish to orange colour. - While harvesting a stalk length of 5 cm alone should be left. Harvesting should be done at 10-12 days interval. - In young plantations, we get more bunches with less bunch weight and in adult plantations the bunch weight is more but the bunch number is less.
Tomato	Flowering to fruit formation stage		- Prevailing weather may conducive for blight in Tomato. - Cloudy and humid weather is most favorable for the disease.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			To manage the blight in tomato apply Ridomil or Indofil or Mancozeb @ 2 gm per liter of water.
		Bacterial wilt KOLASIB	- Uproot all infected plant and burn it. - This disease can be minimized by practicing crop rotation. - Soil dranching with Bordeaux mixture (1:1:100) after one month of planting is effective method to manage this disease.
		Fruit fly MAMIT	In large gardens apply carbaryl 0.2 per cent or malathion 0.15 per cent suspension containing sugar or jeggery at 10 g/l at fortnightly intervals at flowering and fruit initiation.
Early Cole crop	Black spot disease	AIZAWL SERCHHIP	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Prevailing weather may conducive for black spot disease in Cole Crops. - To manage the attack in leafy vegetables and Cole crops, Mancozeb @ 2gm per liter of water may be sprayed.
		Cutworm LUNGLAI	- Prevailing weather is conducive for the attack of cut worm which hide during day time in cracks of the soil and become active at dusk, feed on leave and cut the tender stem. - Apply cypermethrin or carbaryl 2 ml/lt of water or Tricel 1 ml/lt of water in evening every 10 days interval.
Capsicum	Nursery stage	Poly house LAWNGTLAI SAIHA	- Raised bed, nursery bed solarisation. - Bed should be 1m width and conventional length. - Application of FYM (1.5-2.0 kg/ m²) - Line sowing of seeds (7-10cm) - Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			(Apron)/ kg seed ✦ Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
Carrot and radish	Sowing stage		✦ Carrots and radish are sown in raised beds having dimension of 1 metre breadth, any convenient length and raised from 15 to 30 cms. ✦ In order to have an evenly sown crop the seeds are mixed with dry/ loose soil. ✦ In this method the seeds are sown in lines with the help of a marker at a distance of 6 cms apart. ✦ The seeds are then covered with loose and friable soil of about 2-4 cms again depending upon the rainfall and season. ✦ 90: 250: 130 Kg NPK will apply throughout the cropping season where whole quantity of Single Super Phosphate, Muriate of Potash and half the quantity of Urea is to be given as basal dose at the time of final preparation of the land.
Potato	Sowing stage		✦ Prepare the land for potato cultivation without any further delay. ✦ This may help to avoid some bacterial infection at growing stage. ✦ Land may be ploughed thoroughly for proper tillage. ✦ If land is prepared good quality of seeds may be collected for planting. ✦ Cultivation from TPS is also found profitable. ✦ Seed must be treated before sowing.
Onion	Nursery stage		✦ Light irrigation on every alternate day may be given for better establishment and smooth growth. ✦ Mulching must be done after irrigation. ✦ Spray Pendimethalin @ 3.5ml/lt of



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			water in nursery which will give effective control of weed.
		KOLASIB	- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
Brussels sprout	Nursery stage		- Raised bed, nursery bed solarisation. - Bed should be 1m width and conventional length. - Application of FYM (1.5-2.0 kg/ m²) - Line sowing of seeds (7-10cm)
		MAMIT	
		AIZAWL	
French bean	Sowing stage		- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
		SERCHHIP	
Ginger and turmeric	Maturity stage	LUNGLEI	- Field must be inspected daily for disease appearance. - While inspecting, the healthy plants/plots must be marked and kept for planting in the next season. - Marking has to be done properly otherwise when plant matures and gets dried up, it will be very difficult to find out the marked plots.
Zero tillage pea and lentil cultivation in rice fellow	Sowing stage	LAWNGTLAI	- After harvesting of rice, pea and lentil will sow under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the rabi crops pea and lentil.
		SAIHA	



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	- Pea and lentil will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 30 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of lentil seeds and covered the seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Zero tillage toria cultivation in rice fellow	Sowing stage	MAMIT AIZAWL SERCHHIP	- After harvesting of rice, toria under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the toria crops. - Toria crop will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 50 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of toria seeds. Half dose of nitrogen fertilizer along with full dose of phosphorus and potash will apply at the time of sowing. - Seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Pig	All stages	LUNGLEI LAWNGTLAI SAIHA	- Swine flu may occur in pig at all stages. It is a viral flu and highly contagious. Clinical signs include high fever, skin lesions, convulsions, constipation followed by diarrhea and vomiting, less appetite. - In pregnant animals abortion or still birth or weak litters may also happen. Once the symptoms is noticed, immediately informed the nearby veterinary Doctor. Maintain hygiene of the shed with application of Potassium Per Manganite (1-2 gm per in 15 litter of water) and lime both inside and outside of



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Porcine Reproductive Respiratory Syndrome (PRRS).	1. Culling of positive pigs or piglets.
	Adult stage	Swine fever.	2. Vaccination of pigs with SF vaccines at 2 months and yearly interval/6 month interval
Cattle	All age group		Due to prolong dry spell there is a shortage of green grass in the field. For balanced diet and nutrition to your cattle, provide urea molasses treated paddy straw.
	All age group	Foot and Mouth Disease (FMD)	FMD vaccine at 16 week and repeat every 6 month.
	Young stage	Black Quarter (BQ)	- Black Quarter Vaccine (BQV). ❖ Primary vaccination 6 month or above ❖ Revaccination annually
Poultry	Litter management		✚ Good management and sanitation are the best ways to avoid infectious disease in poultry. ✚ Provide ample quantity of clean drinking water. ✚ Avoid feeding of mouldy feed. Don't make sudden changes in feed
	Preventive measures	0-3rd week	✚ Ranikhet Disease- F1 vaccine at (1-6) days of birth and R₂B vaccine for adult birds. ✚ B complex with antibodies
		4th weeks	✚ Coccidiosis- Amprolium or coccidiostat



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratantplantpatho@gmail.com
Dr. L. H. Puii	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr. M. Thoithoi Devi	:	Scientist (Agronomy)	thoiagri@gmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Name of the KVK	Programme Coordinator Name and Designation	KVK Email Id	Phone no/ Mobile no
KVK Lunglei	Dr. Lalmuanzovi Head & Sr. Scientist	kvkhnahthial@gmail.com	9862803750 9436154614
KVK, Kolasib	Mr. Lalrosamga Khiangte Head & Sr. Scientist	kvkkolasib@gmail.com	9436152440
KVK, Serchhip	Mr. K. Laltlanmawia Head & Sr. Scientist	kvkserchhip@gmail.com	9436146115 9615389293
KVK, Champhai	Mrs. Lalrinawmi Renthlei Head & Sr. Scientist	kvkchawzawl@gmail.com	9436159788
KVK, Lawngtlai	Dr. Michel Lallawmkimi Head & Sr. Scientist	kvklawntlai@gmail.com	9436155858
KVK, Saiha	Dr. Vanlalhruaia Hnampe Head & Sr. Scientist	kvksaiha@gmail.com	8974656509
KVK, Mamit	Dr. Samuel Lalliansanga Head & Sr. Scientist	kvkmamit@gmail.com	9436147625
KVK, Aizawl	Dr. K. P. Chaudhary Head & Sr. Scientist	Kpchy@rediffmail.com kvkaizawl@rediffmail.com	9436351669



GRAMIN KRISHI MAUSAM SEWA

ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Champhai

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/Mizo

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	10	10	11	10	11
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Mainly clear
Max RH (%)	99	100	99	99	99
Min RH (%)	37	35	40	40	52
Wind Speed (Kmph)	4	4	4	2	2
*Wind Direction	S-E	S-E	S-E	S-E	S-E

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- May 1-31, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 383.68mm (341.8mm)	Champhai- 239.49mm (250.30mm)	Saiha- 109.52 mm (87.2mm)	Kolasib- 352.38mm (380.9mm)
Lawngtlai-321.51mm (285.5mm)	Lunglei-344.00mm (186.21mm)	Mamit-449.48mm (442.80mm)	Serchhip-411.72mm (259.63mm)

**Ni thum kalta sik leh sa
dinhmun tlangpui**

**14th December– 18th December, 2016
chhunga sik leh sa dinhmun tur tlangpui**

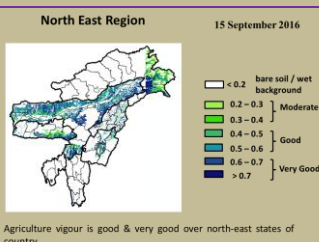
Maximum Tem. (°C): 19-21°C
Minimum Tem. (°C): 6-11°C
Maximum RH (%): 75-86%
Minimum RH (%): 35-54%
Wind Direction: Southeasterly
Cloud cover: Mainly cloudy
Wind Speed: 2km/hr

Tun ni 5 chhung lo awm turah hian ruahtui tla miahlo tura beisei a ni. Khua a lum lai berin 26-27°C a ni ang a. A vawh lai ber in 10-11°C ni tura beisei a ni. RH san lai berin 99-100% leh a hniam lai berin 35-52% ni tur a rin niin. Thli hi darkar khatah 2-4 km vela chakin chhaklam awi zawngin a tleh rin a ni. A tlangpuiin tun ni nga chhung hian khawthiang tak hmuh beisei a ni.

Rainfall: 00.0 mm

Weekly cumulative rainfall: 00.0mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Thlai/ ran /sangha	Spat zawng	Hmalakna tur/ rannung leh natna hrik awm thei te	Agricultural/Horticultural/ animal husbandry atana thurawn
Khasi Mandarin leh acid lime	Seng (Harvesting) hun		- Serthlum rah chu a hringduk atanga rawng eng dala arawn inthlak hunah lawh tur a ni. - Mandarins leh sweet oranges te hian an puitlin nan ni 240-280 vel an mamawh. - A rah puitling tawhin a hmin rawng a rawn chhuah tan hunah lawh tur a ni a, ni 10-15 inkar danah wawi 2- 3 lawh tur a ni - Limes leh lemons hian puitlin nan ni 150-160 an mamawh. - Limes leh lemons te hi kum khatah wawi 2 emaw wawi 3 emaw an rah thei. - Rei tak dahthat theihna tur vur bawm (cold storage)changtlung tak ser rah chi hrang hrang tan a awm hrang vek bawk a ni. - Ser rah te chu boruak thianghlim luh theihna tur bawm (CFB Box) 30 cm x 30cm x 30 cm azau ah pack fel tur a ni.
		Ser rah bawmtu rannung thlawkthei (Fruitfly)	Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
Sapthei	Seng (Harvesting) hun		- A kung phun a nih atanga thla sawm hnu ah rah a pe chhuak tan a, chuan thla 16-18 a nih thlengin a rah chhunzawm ta thin a ni. - Rah hun bik hi tum hnih (2) a nei a chu chu August -



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			December leh March- May ah te an ni. - A rah hmin nan ni 80-85 vel a mamawh thin. - A rah rawn senduk (purple) toh chu a kuang tlem a zawng nen lawh tel tur a ni. - A rah seng tawh ho chu a pian hmang leh rihna te a tlakhniam hma in a rang lam a hralh zawh vat tur a ni. - A ro hnu in a kor te chu zur angin lang mahse a chhung lam erawh ni engemaw chen chu ala tha vek thung ang. - A kung a natna nei te chu lakkhawm a hal ral vek tur. - Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jeggery 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
		Sapthei rah bawmtu rannung thlawkthei (Fruitfly)	
Balhla	Seng (Harvesting) hun		- A hring atanga a eng a a inthlak hunah . - A thlar a balhla ho hmun li a then a hmun thum an pum that a a bak zawngin kil anla neih lain. - Balhla hi anla puam a an hrin that lai mahse an hmin hma si in. - Balhla te an sin lai leh rawng hring duk anla nih lai chuan sengloh tur a ni. - Rawng eng an nih tawh chuan seng nan a tlai tawh tihna a ni.
		Balhla zung eichhetu rannung (Banana Rhizome)	Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		weevil)	tui chu rannung tui 50 per cent a keu hun velah kah tur a ni (July kar hmasa ber a ni tlangpui).
		Banana panama wilt	✚ Natna kai lo chauh phun tur. Natna kai ho chu a zung nen kara paih tur. Farm-a hmanraw hrang hrangte natna hrik kai lo tura tihfai thin bawk tur a ni.
		Banana beetle	✚ A bul vela hnim to tihfai tur ✚ A no rawn chawr thar mamawh loh te paih tur ✚ Alphamethrin 0.01 per cent hman tur
Oil palm	A rah insiam tan hunlai	AIZAWL CHAMPA SERCHHIP	✚ A nu leh pa par hma lutuk te thenfai tur ✚ Heihian a kung a ti thag tha in zung a kaih ngheh tir bik thin a ni. Phun atanga thla 14-18 velah an par tlangpui ✚ A par nu leh pa hi a kung in vui a rawn chhuah tan tirh ah pawh phawi vat tur anni. ✚ Kut in emaw a pawhphawina hmanrua DOPR in ansiam hmangin awlsam takin a tih theih a ni. ✚ Hetianga a par nu leh pa lak hi kum hnih leh chanve atanga kum thum annih vel thlengin a tih zawm theih a ni.
		LUNGLEI LAWNGTLAI SAIHA	✚ Thli leh rannung ten inthlahchhawanna kawngah an pui thin a, amaherawhchu thli hmanga inthlahchhawanna erawh hichuan a thawh hlawklo. ✚ Inthlahchhawn nan a rannung tangkai tak <i>Elaeidobius kamerunicus</i> hian a inthlahchhawanna ah leh a rah tur insiam kawngah a pui nasa hle a ni. ✚ Phun anih atanga kum hnih leh chanve hnu ah he rannung hi chhuah a tha a, kum thum hnu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			a a kung in a that puiloh anih chuan he rannung hi chhuah vek tur a ni.
Colocasia	A seng hun	KOLASIB	- A hnah te a eng (yellow) tan in a then an tla tan bawk a, chu chuan seng a hun a ni tih a lan tir. - Phun atanga thla 6-8 liam hnu ah seng theih a ni. - Seng dawnin uluk takin a zung nen phawi chhuah vek tur a ni. - Bal chu lahrangin ni hlimah pho hul tur a ni.
Baibing (Local vegetable)	A seng hun	MAMIT AIZAWL CHAMPA	- A kung bulah hnim a to tur a ni lo. - A rah hmin ho chu seng vek tur. - A kum leh atan a chi dah tur.
Tomato	Par a chhuah hma	SERCHHIP LUNGLEI	- Leichhung a boruak a luh that a zung alo that zawk theihnan hnim to pawhfai leh lei chawhphut thin tur. - Phun anih hnu ni 30-45 hnu ah lei chawhphut a rihvur tur. - A kung dawm tu tur in pal ban phun zel ni se, chu chuan a rah that leh a thar tam kawngah apui in a tangkai hle a ni. - Thlai bul tih hnawm nan a polythene dum hman hian hnim to tur a veng a, thlai a thang chak a, a par hma tir a, a thar tam phah tir bawk a ni.
		Bacterial Wilt	- Natna vei te chu a zung chawp a pawh phawi a hal ral vek tur. - Thlai chin dan thlakkual (crop rotation) hmangin he natna hi a tih ziaawm theih a ni. - Phun atanga thla khat hnu ah Bordeaux mixture (1:1:100) hmanga lei tih hnawn hi he natna enkawl nan hian a tangkai in a sawt em em a ni.
Early cole crop	Par a chhuah hma	LAWNGTLAI SAIHA	Leichhung a boruak a luh that a zung alo that zawk theihnan hnim to pawhfai leh lei chawhphut thin



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	tur. - Bawr tha tak thar chhuah theih nan phunsawn a nih hnu atanga kar 4-5 thlang a bul chawhphut a lei tih thawl tur a ni. - Kar khat dan zel ah tui pek tur a ni. - A bawr (head) a keh chhiatloh nan a puitlin hun lai velin tui pek tamloh hram tur.
		N tlakchhamna	- He tlakchhamna hi neem cake @0.4kg/m² hmangin a enkawl dam theih a ni. - He natna hi a lo lan chuan 2 per cent urea hman tur.
		P tlakchhamna	- He tlakchhamna hi phosphorus based fertilizer @0.4kg/m² hmangin a enkawl dam theih a ni. - He natna hi a lo lan chuan 4 per cent DAP hman tur.
Capsicum	A chi kui hun	Poly house	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawk a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar
		LAWNGTLAI	- A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni. - A chi theh atanga ni 10-15 hnu ah tui litre khat ah 1% Bordeaux mixture emaw 2 g captan emaw 3 copper oxychloride emaw siam a a kuina hmun phuh hnawn tur.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Purunsen	A chi kui hun	Poly house	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawh a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar
	MAMIT	AIZAWL	- A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni. - A chi theh atanga ni 10-15 hnu ah tui litre khat ah 1% Bordeaux mixture emaw 2 g captan emaw 3 copper oxychloride emaw siam a a kuina hmun phuh hnawn tur.
French Bean	A chi theh hun	LUNGLEI	- A chi danglam leh hrisel, chang tha leh thianghlim chiah theh tur. - Thing ngul hman chi tan a chi theh inkar tur chu 60cm x 60 cm a ni. - A chi theh hma in a chi chu hectare khat ah Rhizobium vermicompost 10t hman a enkawl tur a ni.
Sawhthing leh Aieng	Par a chhuah hma	LAWNGTLAI	- Thlai hnah, a tang ro leh hnim te chu paihfai vek tur. - Lin tirh (a to chhuah hma) in Atrazine (Atratraf 50wp, Gesaprim 500fw) 1.0-1.5kg a.i tui litre 600 ah pawlh tur a ni. Alachlor (Lasso) @2.25kga.i ha⁻¹ Metolachlor (Dual) @1.5-2.0 kg a.i ha⁻¹, Pendimethalin (Stomp)

			@ 1-1.5kg a.i ha ⁻¹ te hian hnimhnah lian lampang chi a veng a ni.
		Turmeric shoot borer (Aieng kung ei chhetu rannung) KOLASIB	✚ Rannung hlo imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1.0g emaw dimethoate 2ml emaw tui litre khatah pawlh a, hman tur a ni.
Kharif rice	A puitling hun/a vui insiam tan hun	MAMIT AIZAWL CHAMPAI	✚ A rawng chu a hring atangin gold rawngah a inthlak ang. ✚ Tui tling luan chhuahna tur mumal tak a sir kil khatah siam tur. ✚ A vui hmasa te tana harsatna awmlo tur in tui tling te chu paih chhuah vek tur.
		Sazu tihchhiat SERCHHIP LUNGLEI	✚ Sazu chhenna hmun tihchhiat leh fai taka buh hmun enkawl zir. ✚ Buh hmun leh achheh vel a awmhmun an khuar theihna tur atana hmanraw remchang hnimhnah leh thlai ningnawi emaw buh bangnawi awmthei hrim hrim chu thenfai vek tur. ✚ Sazu in a a tihchhiat nasatna hmun ah chuan sazu hrai na tur 2 per cent Zinc phosphide (96 parts of broken rice + 2 parts of edible oil + 2 parts of 98% ZnP) hman tur a ni. ZNP tur (poison) hman hma in a thlem dan tur zir a enchhin hmasak phot tur a ni.
		Sava tihchhiat LAWNGTLAI SAIHA	✚ Meithal chi hrim hrim eng pek chhuah pah a bengchheng siam thei hmanrua ✚ Balloon hampuar buh kunga tawnbeh hi sava hnawhbo nan senso hautaklo si a hman thin a ni.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

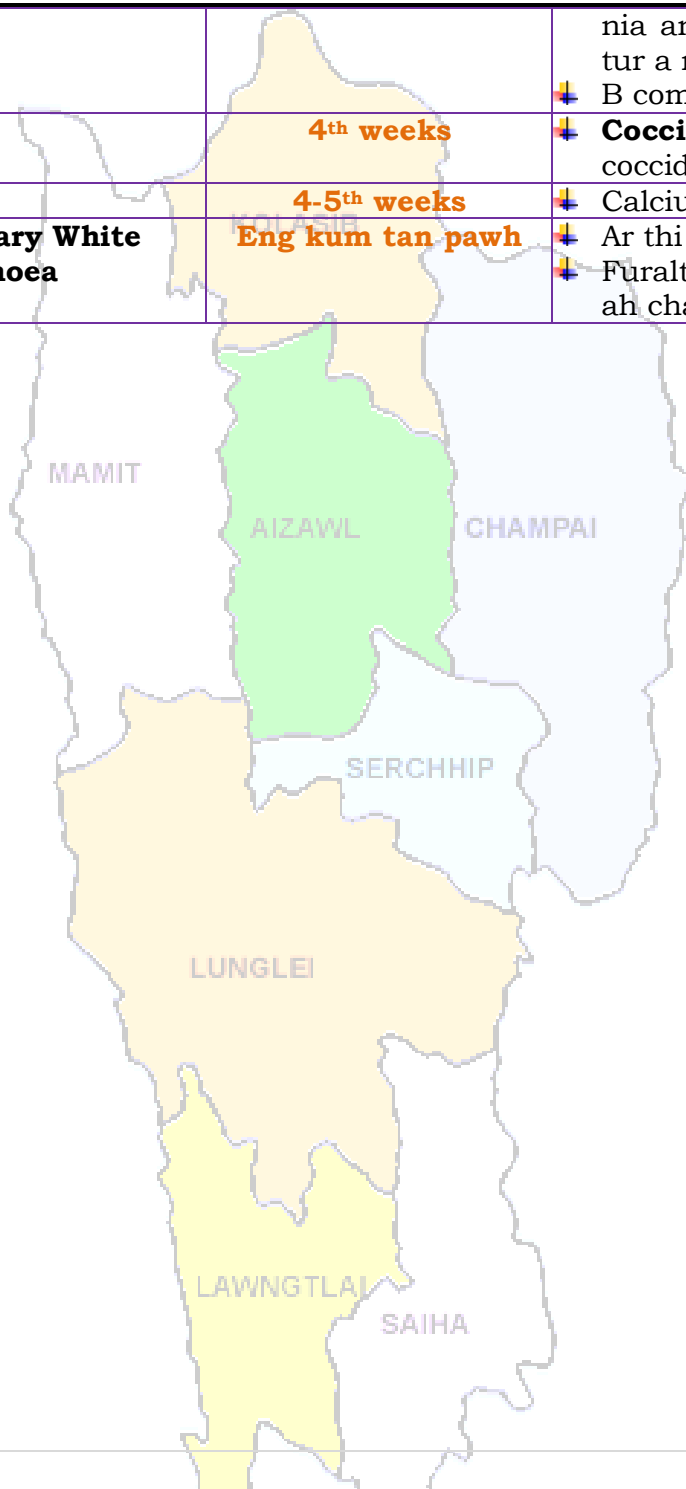
Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			Lekhachhaih hi sava hlahu atan hman thin a ni bawk.
		Rice yellow stem borer KOLASIB	- A hnah hmawr tan tur. - A kung hrisel lo lai paih tur - Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu tui chu kah tur.
Vawk	Kumtluanin	Vawk natna	Vawkin heng natna chi hrang hrang nguina, che tha theilo, ek tang emaw kawthalo ang chi an lan tir a nih chuan ran doctor pan a rawn vat tur.
		Porcine Reproductive Respiratory Syndrome (PRRS). MAMIT	1. A natna vei vawk te chu thah a phum tur a ni.
	A puitling hun	Swine fever.	2. Vawk thla hnih a nihin SF vaccine pek tur a ni a, he vaccine hi thla ruk emaw kumtluanin pek chhunzawm tur
Bawng	Kumtluanin	Foot and Mouth Disease (FMD)	Thla16 a upa an rih in FMD vaccine pek tur a nia, thla 6 danah pek chhunzawm tur a ni.
	A naupan lai	Black Quarter (BQ)	- Black Quarter Vaccine (BQ) - Thla ruk an tlin hunah vaccine lak tan tur. - Kumkhat hnu ah vaccine pek leh tur.
Ar	Ar ek enkawl dan		- Atui awpna in ah eng darkar 12-14 tal a in chhi tur a ni. - An ekna tur hmun chu cm 7.5 – 10 inkar vel a chhah tur a ni. - Thingzei nawi emaw buhpawl emaw badam kawr emaw tehi an ekna tur atan a phah theih a ni. - Heng buhpawl, thingzei nawi te hi hnawng reng a vawn theih nan chinai phul tur a ni.
	Natna thlengthei enkawl lawk dan	0-3 rd week	Ranikhet Disease- Ar note an pian hlimin F₁ vaccine pek tur a

			nia an puitlin hunah R ₂ B pek leh tur a ni.
		4 th weeks	B complex leh antibodies
		4-5 th weeks	Coccidiosis - Amprolium emaw coccidiostat pek tur.
	Bacillary White Diarrhoea	Eng kum tan pawh	Calcium tonic leh B ₁₂
			Ar thi zawng zawng hal ral vak tur
			Furaltadone 0.5g chu tui litre khat ah chawhpawlh a hman tur.





GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratanplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr Y. Ramakrishna	:	Farm manager (T-6)	ramakrishnaiari@rediffmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Dr. Lalmuanzovi	:	PC KVK Lunglei	kvklunglei@gmail.com kvknahtial@gmail.com
Mr. C. Lalthlamuana	:	PC KVK, Kolasib	kvkkolasib@gmail.com
Mrs. Lalnunpui Parte	:	PC KVK, Serchhip	Mmami997@yahoo.com kvkserchhip@gmail.com
Ms. Lalrinawnri Renthlei	:	PC KVK, Champhai	pckvkkhawzawl@rediffmail.com
Mr. Lalrosanga Khiantge	:	PC KVK, Lawngtlai	vvl9@rediffmail.com kvklawngtalai@rediffmail.com
Ms. C. Racheal	:	PC KVK, Saiha	kvksaiha@gmail.com rachoza@gmail.com
Mr. Vanlalhruaia Hnamte	:	PC KVK, Mamit	kvkmamit@yahoo.in
Dr. K. P. Chaudhary	:	PC KVK, Aizawl	Kpchy@rediffmail.com kvkaizawl@rediffmail.com



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Kolasib

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/English

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	10	10	11	11	12
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	99	98	97	96	99
Min RH (%)	37	35	40	38	50
Wind Speed (Kmph)	4	4	4	4	2
*Wind Direction	E	E	E	E	E

Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E, Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.

STATUS OF MONSOON- June 1-30, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 384.87mm (430.2mm)	Champhai- 105.48mm (359.89mm)	Saiha- 307.40 mm (507.7mm)	Kolasib- 236.00mm (428.1mm)
Lawngtlai-291.20mm (453.1mm)	Lunglei-326.00mm (465.14mm)	Mamit-204.87mm (442.80mm)	Serchhip-411.72mm (259.62mm)

Weather summary of the past three days

Maximum Tem. (°C):26-27°C
Minimum Tem. (°C):14-15°C
Maximum RH (%):74-80%
Minimum RH (%):48-54%
Wind Direction: southeasterly
Cloud cover: Mainly cloudy
Wind speed: 2 km/hr

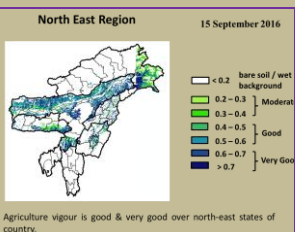
Rainfall: 00.0 mm

Weather forecast valid from 14th December, 2016 To 18th December, 2016.

There is no chance of rainfall during the next 5 days. The maximum and minimum temperatures for the next 5 days may range for 26-27°C and 10-12°C. Maximum relative humidity is expected in the range of 96-99% and minimum may from 35-50%. Wind direction would be easterly with the wind speed of 2-4 km per hour. Clear sky will prevail during the next five days.

Weekly cumulative rainfall: 00.0 mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Main Crop / Animal / Fisheries	Stage	Cultural practices/ Pest/ Diseases	Agricultural / Horticultural/ animal husbandry advisories
Khasi Mandarin and acid lime	Harvesting stage	KOLASIB MAMIT AIZAWL	- Orange is picked when colour turn to dark green to pale yellow. - Mandarins and sweet oranges normally take 240-280 days to arrive at maturity. - Mature fruits at colour break stage are picked up in 2 - 3 intervals of 10-15 days. - Limes and lemons take 150-160 days for maturity. - There may be 2 or 3 crops in a year in limes and lemons. - The cold storage conditions for long term storage for different citrus fruits are available. - Oranges may be packed in well ventilated CFB boxes - 30 cm x 30 cm x 30 cm.
		Fruit fly	In large gardens apply carbaryl 0.2 per cent or malathion 0.15 per cent suspension containing sugar or jeggery at 10 g/l at fortnightly intervals at flowering and fruit initiation.
Banana	Harvesting stage	LUNGLEI LAWNGTLAI SAITAI	- Change of colour from green to yellowish. - Fingers are about three quarters full i.e. 3/4 of fruit is rounded - Ridges should still be prominent on the remaining quarter of the finger. - Harvest bananas when they are swollen and green but before they become ripe (plump and yellow). - Too early (when the bananas are thin and dark green). - Too late (when they are thick and turning yellow).
		Banana Rhizome weevil	Apply insecticide like imidacloprid 0.5 ml or phosolone 1.5 ml or acephate 1.0 g or dimethoate 2 ml /l at 50% egg hatching



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			stage when 1 st instars predominate which coincides with I Fortnight of July.
		Banana panama wilt	✚ Use disease free planting material. Roughing of infected plant and destroy them. Removing of excess male buds prevent disease spread. Disinfect the farm equipments.
		Banana beetle	✚ Removal of weeds from basin ✚ Removal of unwanted sucker ✚ Application of alphamethrin @ 0.01%.
Oil plam	Harvesting stage	AIZAWL	✚ Harvest only ripe fruit bunches and collect all loose fruit using high quality harvesting equipment. ✚ The oilplam will be ready for harvest ready for harvesting in 2.5 to 3 years after the plantation in the main field. ✚ Harvesting can be done when the fruit on plam turns into yellowish to orange colour. ✚ While harvesting a stalk length of 5 cm alone should be left. Harvesting should be done at 10-12 days interval. ✚ In young plantations, we get more bunches with less bunch weight and in adult plantations the bunch weight is more but the bunch number is less.
Tomato	Blight disease	LUNGLEI	✚ Prevailing weather may conducive for blight in Tomato. ✚ Cloudy and humid weather is most favorable for the disease. ✚ To manage the blight in tomato apply Ridomil or Indofil or Mancozeb @ 2 gm per liter of water.
Potato	Sowing stage	LAWNGTLAI	✚ Prepare the land for potato cultivation without any further delay. ✚ This may help to avoid some bacterial infection at growing stage. ✚ Land may be ploughed thoroughly for proper tillage. ✚ Seed must be treated before sowing. ✚ Light irrigation on every alternate day may be given for better establishment



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Early Cole crop	Black spot disease	KOLASIB	and smooth growth. - Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Prevailing weather may conducive for black spot disease in Cole Crops. - To manage the attack in leafy vegetables and Cole crops, Mancozeb @ 2gm per liter of water may be sprayed.
		MAMIT	Cutworm AIZAWL - Prevailing weather is conducive for the attack of cut worm which hide during day time in cracks of the soil and become active at dusk, feed on leave and cut the tender stem. - Apply cypermethrin or carbaryl 2 ml/lt of water or Tricel 1 ml/lt of water in evening every 10 days interval.
Onion	Nursery stage	Poly house	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Spray Pendimethalin @ 3.5ml/lt of water in nursery which will give effective control of weed.
		LUNGLEI	- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
French bean	Sowing stage	LAWNGTLAI	- Variable, healthy, well mature and pure seeds should be sown. - Optimum spacing for pole type 60 cm X 30 cm. - Before sowing seed should be treated with Rhizobium vermicompost@10 t/ha.
		SAIHA	



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Ginger and turmeric	Maturity stage	KOLASIB	- Field must be inspected daily for disease appearance. - While inspecting, the healthy plants/plots must be marked and kept for planting in the next season. - Marking has to be done properly otherwise when plant matures and gets dried up, it will be very difficult to find out the marked plots.
Zero tillage pea and lentil cultivation in rice fellow	Sowing stage	MAMIT AIZAWL SERCHHIP	- After harvesting of rice, pea and lentil will sow under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the rabi crops pea and lentil. - Pea and lentil will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 30 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of lentil seeds and covered the seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Zero tillage toria cultivation in rice fellow	Sowing stage	LUNGLEI LAWNGTLAI SAIHA	- After harvesting of rice, toria under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the toria crops. - Toria crop will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 50 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of toria seeds. Half dose of nitrogen fertilizer along with full dose of phosphorus and potash will apply at the time of sowing. - Seed with soil and FYM mixture (2:1



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Soybean	Pod formation stage	Zero tillage	ratio) to give a good seed-soil contact. - Light irrigation on every alternate day may be given for better establishment and smooth growth. - Earthing up soil near to plant for better support.
Green gram, black gram and French bean (After Pre kharif rice harvest)	Vegetative stage	Zero tillage	- Clear base of the plant. - Earthing up soil near to plant for better support. - For French bean use bamboo for staking or support. - Use split dose of fertilizer for better fruiting for French bean.
Rabi Maize	Sowing stage		- Prepare the land for maize cultivation without any further delay. - This may help to avoid some cob borer infestation. - Seed is being placed in furrows. - Seed should be treated with Thiram @4 g/kg seed. - Use optimum seed rate (20-25 kg/ha) for desire plant population. - Apply well decomposed FYM @ 5-10 t/ha along with 80:60:40 kg N, P₂O₅ and K₂O/ha incorporate with soil before sowing. Half nitrogen dose will use at the time of sowing and remaining 25% after one month and 25% at flowering stage.
Pig	All stages		- As the weather gets colder, your pigs' energy requirement will increase, as they need more energy to keep warm. - Regularly monitor their level of 'fitness' and increase their feed intake to maintain. - Fish oils are excellent for providing slow-release energy with the added advantage of a high level of omega-3.
		Porcine Reproductive	Culling of positive pigs or piglets.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Respiratory Syndrome (PRRS).	
	Adult stage	Swine fever.	2. Vaccination of pigs with SF vaccines at 2 months and yearly interval/6 month interval
Cattle	All age group	KOLASIB	Due to prolong dry spell there is a shortage of green grass in the field. For balanced diet and nutrition to your cattle, provide urea molasses treated paddy straw.
	All age group	Foot and Mouth Disease (FMD)	FMD vaccine at 16 week and repeat every 6 month.
	Young stage	Black Quarter (BQ)	- Black Quarter Vaccine (BQV). ❖ Primary vaccination 6 month or above ❖ Revaccination annually
Poultry	Litter management	SERCHHIP	✚ Birds require adequate space, sufficient feed to meet their nutritional requirements and an adequate supply of good-quality water. ✚ Good management and sanitation are the best ways to avoid infectious disease in poultry. ✚ Provide ample quantity of clean drinking water. ✚ Avoid feeding of mouldy feed. Don't make sudden changes in feed
	Preventive measures	0-3rd week	✚ Ranikhet Disease- F1 vaccine at (1-6) days of birth and R₂B vaccine for adult birds. ✚ B complex with antibodies
		4th weeks	✚ Coccidiosis- Amprolium or coccidiostat
		4-5th Weeks	✚ Calcium tonic fortified with B₁₂
Fish	All age group	LAWNGTLAI	✚ An extra dose of Lime @ 200 kg per ha may be applied to prevent the outbreak of EUS (ulcer disease). ✚ Feeding and fertilizer need to be analyzed as per the depth of the water body.



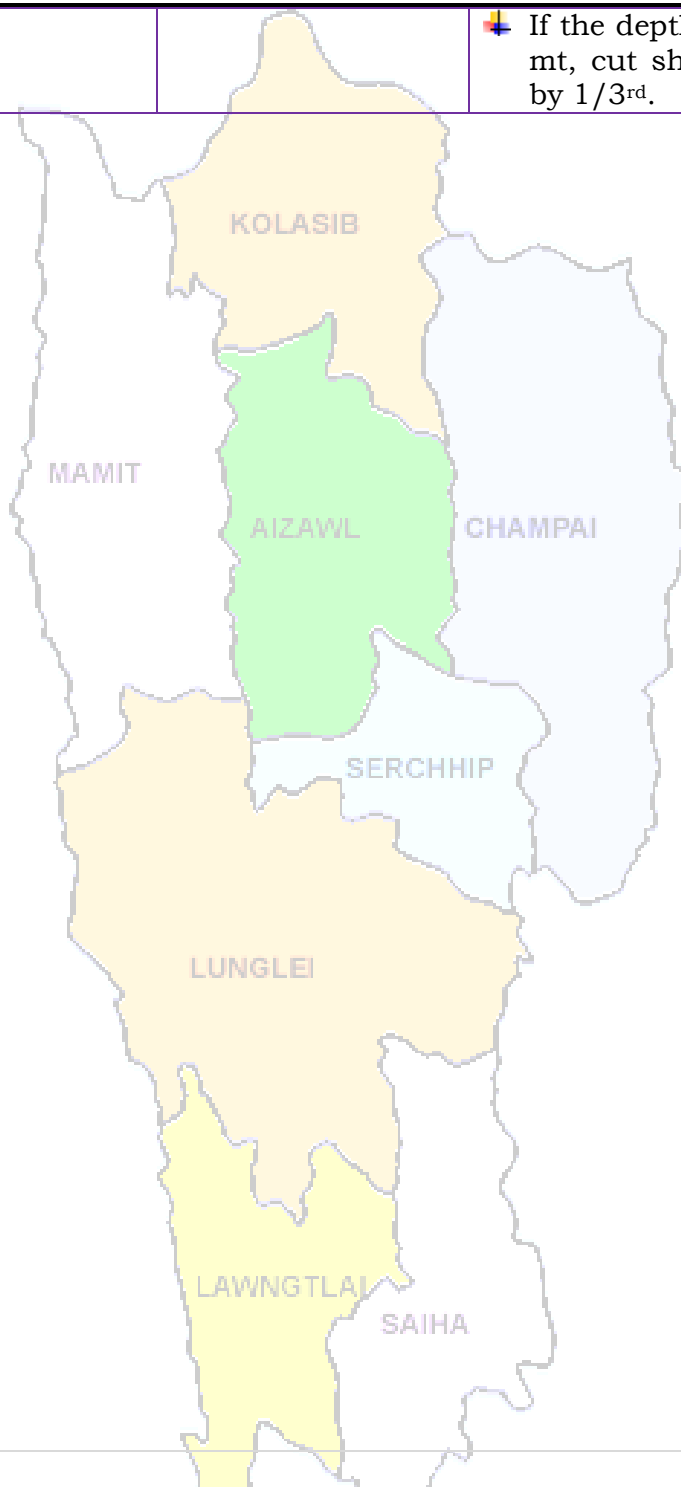
GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



			⚡ If the depth of water body drop below 1 mt, cut short the feeding and fertilizer by 1/3 rd .
--	--	--	---





GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratantplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr. M. Thoithoi Devi	:	Scientist (Agronomy)	thoiagri@gmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in
Mrs. Monika Bora	:	Meteorological Observer (IMD)	boramonika@rediffmail.com

Collaborating Department:

Name of the KVK	Programme Coordinator Name and Designation	KVK Email Id	Phone no/ Mobile no
KVK Lunglei	Dr. Lalmuanzovi Head & Sr. Scientist	kvkhnahthial@gmail.com	9862803750 9436154614
KVK, Kolasib	Mr. Lalrosamga Khiangte Head & Sr. Scientist	kvkkolasib@gmail.com	9436152440
KVK, Serchhip	Mr. K. Laltlanmawia Head & Sr. Scientist	kvkserchhip@gmail.com	9436146115 9615389293
KVK, Champhai	Mrs. Lalrinawmi Renthlei Head & Sr. Scientist	kvkchawzawl@gmail.com	9436159788
KVK, Lawngtlai	Dr. Michel Lallawmkimi Head & Sr. Scientist	kvklawntlai@gmail.com	9436155858
KVK, Saiha	Dr. Vanlalhruaia Hnampe Head & Sr. Scientist	kvksaiha@gmail.com	8974656509
KVK, Mamit	Dr. Samuel Lalliansanga Head & Sr. Scientist	kvkmamit@gmail.com	9436147625
KVK, Aizawl	Dr. K. P. Chaudhary Head & Sr. Scientist	Kpchy@rediffmail.com kvkaizawl@rediffmail.com	9436351669



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Kolasib

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/Mizo

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	27
Min Temp (°C)	10	10	11	11	12
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	99	98	97	96	99
Min RH (%)	37	35	40	38	50
Wind Speed (Kmph)	4	4	4	4	2
*Wind Direction	E	E	E	E	E

Northerly- **N**, North-Easterly- **N-E**, Easterly- **E**, South-Easterly- **S-E**,
Southerly- **S**, South-Westerly- **S-W**, Westerly- **W**, North-westerly- **N-W**.

STATUS OF MONSOON- May 1-31, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 383.68mm (341.8mm)	Champhai- 239.49mm (250.30mm)	Saiha- 109.52 mm (87.2mm)	Kolasib- 352.38mm (380.9mm)
Lawngtlai-321.51mm (285.5mm)	Lunglei-344.00mm (186.21mm)	Mamit-449.48mm (442.80mm)	Serchhip-411.72mm (259.63mm)

**Ni thum kalta sik leh sa
dinhmun tlangpui**

**14th December– 18th December, 2016
chhunga sik leh sa dinhmun tur tlangpui**

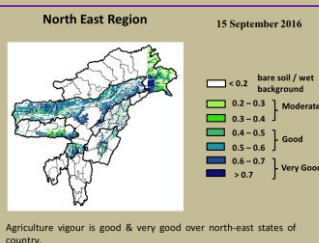
Maximum Tem. (°C):26-27°C
Minimum Tem. (°C):14-15°C
Maximum RH (%):74-80%
Minimum RH (%):48-54%
Wind Direction: southeasterly
Cloud cover: Mainly cloudy
Wind speed: 2 km/hr

Tun ni 5 chhung lo awm turah hian ruahtui tla miahlo tura beisei a ni. Khua a lum lai berin 26-27°C a ni ang a. A vawh lai ber in 10-12°C ni tura beisei a ni. RH san lai berin 96-99% leh a hniam lai berin 35-50% ni tur a rin niin. Thli hi darkar khatah 2-4 km vela chakin chhaklam awi zawngin a tleh rin a ni. A tlangpuiin tun ni nga chhung hian khawthiang tak hmuh beisei a ni.

Rainfall: 00.0 mm

Weekly cumulative rainfall: 00.0mm

***/NDVI for Mizoram**



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Thlai/ ran /sangha	Spat zawng	Hmalakna tur/ rannung leh natna hrik awm thei te	Agricultural/Horticultural/ animal husbandry atana thurawn
Khasi Mandarin leh acid lime	Seng (Harvesting) hun		- Serthlum rah chu a hringduk atanga rawng eng dala arawn inthlak hunah lawh tur a ni. - Mandarins leh sweet oranges te hian an puitlin nan ni 240-280 vel an mamawh. - A rah puitling tawhin a hmin rawng a rawn chhuah tan hunah lawh tur a ni a, ni 10-15 inkar danah wawi 2- 3 lawh tur a ni - Limes leh lemons hian puitlin nan ni 150-160 an mamawh. - Limes leh lemons te hi kum khatah wawi 2 emaw wawi 3 emaw an rah thei. - Rei tak dahthat theihna tur vur bawm (cold storage)changtlung tak ser rah chi hrang hrang tan a awm hrang vek bawk a ni. - Ser rah te chu boruak thianghlim luh theihna tur bawm (CFB Box) 30 cm x 30cm x 30 cm azau ah pack fel tur a ni.
		Ser rah bawmtu rannung thlawkthei (Fruitfly)	Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
Sapthei	Seng (Harvesting) hun		- A kung phun a nih atanga thla sawm hnu ah rah a pe chhuak tan a, chuan thla 16-18 a nih thlengin a rah chhunzawm ta thin a ni. - Rah hun bik hi tum hnih (2) a nei a chu chu August -



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			December leh March- May ah te an ni. - A rah hmin nan ni 80-85 vel a mamawh thin. - A rah rawn senduk (purple) toh chu a kuang tlem a zawng nen lawh tel tur a ni. - A rah seng tawh ho chu a pian hmang leh rihna te a tlakhniam hma in a rang lam a hralh zawh vat tur a ni. - A ro hnu in a kor te chu zur angin lang mahse a chhung lam erawh ni engemaw chen chu ala tha vek thung ang. - A kung a natna nei te chu lakkhawm a hal ral vek tur. - Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
		Sapthei rah bawmtu rannung thlawkthei (Fruitfly)	
Balhla	Seng (Harvesting) hun		- A hring atanga a eng a a inthlak hunah . - A thlar a balhla ho hmun li a then a hmun thum an pum that a a bak zawngin kil anla neih lain. - Balhla hi anla puam a an hrin that lai mahse an hmin hma si in. - Balhla te an sin lai leh rawng hring duk anla nih lai chuan sengloh tur a ni. - Rawng eng an nih tawh chuan seng nan a tlai tawh tihna a ni.
		Balhla zung eichhetu rannung (Banana Rhizome)	Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		weevil)	tui chu rannung tui 50 per cent a keu hun velah kah tur a ni (July kar hmasa ber a ni tlangpui).
		Banana panama wilt	Natna kai lo chauh phun tur. Natna kai ho chu a zung nen kara paih tur. Farm-a hmanraw hrang hrangte natna hrik kai lo tura tihfai thin bawk tur a ni.
		Banana beetle	A bul vela hnim to tihfai tur A no rawn chawr thar mamawh loh te paih tur Alphamethrin 0.01 per cent hman tur
Oil palm	A rah insiam tan hunlai	AIZAWL CHAMPA SERCHHIP	A nu leh pa par hma lutuk te thenfai tur Heihian a kung a ti thag tha in zung a kaih ngheh tir bik thin a ni. Phun atanga thla 14-18 velah an par tlangpui A par nu leh pa hi a kung in vui a rawn chhuah tan tirh ah pawh phawi vat tur anni. Kut in emaw a pawhphawina hmanrua DOPR in ansiam hmangin awlsam takin a tih theih a ni. Hetiang a par nu leh pa lak hi kum hnih leh chanve atanga kum thum annih vel thlengin a tih zawm theih a ni.
		LUNGLEI LAWNGTLAI SAIHA	Thli leh rannung ten inthlahchhawanna kawngah an pui thin a, amaherawhchu thli hmanga inthlahchhawanna erawh hichuan a thawh hlawklo. Inthlahchhawn nan a rannung tangkai tak <i>Elaeidobius kamerunicus</i> hian a inthlahchhawanna ah leh a rah tur insiam kawngah a pui nasa hle a ni. Phun anih atanga kum hnih leh chanve hnu ah he rannung hi chhuah a tha a, kum thum hnu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			a a kung in a that puiloh anih chuan he rannung hi chhuah vek tur a ni.
Colocasia	A seng hun	KOLASIB	- A hnah te a eng (yellow) tan in a then an tla tan bawk a, chu chuan seng a hun a ni tih a lan tir. - Phun atanga thla 6-8 liam hnu ah seng theih a ni. - Seng dawnin uluk takin a zung nen phawi chhuah vek tur a ni. - Bal chu lahrangin ni hlimah pho hul tur a ni.
Tomato	A chi kui hun	A chi kuitiahna hmun tur siam dan	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawk a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar hlat zawng hi 7-10 cm tur a ni.
		Nursery natna (Damping off)	A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni.
Sawhthing leh Aieng	Par a chhuah hma	LAWNGTLAI SAIHA	- Thlai hnah, a tang ro leh hnim te chu paihfai vek tur. - Lin tirh (a to chhuah hma) in Atrazine (Atratraf 50wp, Gesaprim 500fw) 1.0-1.5kg a.i tui litre 600 ah pawlh tur a ni. Alachlor (Lasso) @2.25kga.i ha⁻¹ Metolachlor (Dual) @1.5-2.0 kg a.i ha⁻¹, Pendimethalin (Stomp) @ 1-1.5kg a.i ha⁻¹ te hian hnimhnah lian lampang chi a



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Turmeric shoot borer (Aieng kung ei chhetu ranning)	veng a ni. ✚ Ranning hlo imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1.0g emaw dimethoate 2ml emaw tui litre khatah pawlh a, hman tur a ni.
Kharif rice	A puitling hun/a vui insiam tan hun	KOLASIB	✚ A rawng chu a hring atangin gold rawngah a inthlak ang. ✚ Tui tling luan chhuahna tur mumal tak a sir kil khatah siam tur. ✚ A vui hmasa te tana harsatna awmlo tur in tui tling te chu paih chhuah vek tur.
		MAMIT	
		Sazu tihchhiat	✚ Sazu chhenna hmun tihchhiat leh fai taka buh hmun enkawl zir. ✚ Buh hmun leh achheh vel a awmhmun an khuar theihna tur atana hmanraw remchang hnimhna leh thlai ningnawi emaw buh bangnawi awmthei hrim hrim chu thenfai vek tur. ✚ Sazu in a a tihchhiat nasatna hmun ah chuan sazu hrai na tur 2 per cent Zinc phosphide (96 parts of broken rice + 2 parts of edible oil + 2 parts of 98% ZnP) hman tur a ni. ZNP tur (poison) hman hma in a thlem dan tur zir a enchhin hmasak phot tur a ni.
		AIZAWL	
		CHAMPAI	
		SERCHHIP	
		LUNGLEI	
		Sava tihchhiat	✚ Meithal chi hrim hrim eng pek chhuah pah a bengchheng siam thei hmanrua ✚ Balloon hampuar buh kunga tawnbeh hi sava hnawhbo nan senso hautaklo si a hman thin a ni. ✚ Lekhachhaih hi sava hlauh atan hman thin a ni bawk.
		LAWNGTLAI	
		SAIHA	



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Rice yellow stem borer	- A hnah hmawr tan tur. - A kung hrisel lo lai paih tur - Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu tui chu kah tur.
Bekang	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut thin tur.
Green gram, black gram leh French bean (nipui buh seng zawh hunah)	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut rih vur thin tur. - French bean tan bik athlawp tu atan mau hman tur. - A rah athat lehzuall nan French bean tan bik chuan mumal takin a in henin leitha pek tur.
Vawk	Kumtluanin	Vawk natna	Vawkin heng natna chi hrang hrang nguina, che tha theilo, ek tang emaw kawthalo ang chi an lan tir a nih chuan ran doctor pan a rawn vat tur.
		Porcine Reproductive Respiratory Syndrome (PRRS).	1. A natna vei vawk te chu thah a phum tur a ni.
	A puitling hun	Swine fever.	2. Vawk thla hnih a nihin SF vaccine pek tur a ni a, he vaccine hi thla ruk emaw kumtluanin pek chhunzawm tur
Bawng	Kumtluanin	Foot and Mouth Disease (FMD)	Thla16 a upa an rih in FMD vaccine pek tur a nia, thla 6 danah pek chhunzawm tur a ni.
	A naupan lai	Black Quarter (BQ)	- Black Quarter Vaccine (BQ) - Thla ruk an tlin hunah vaccine lak tan tur. - Kumkhat hnu ah vaccine pek leh tur.
Ar	Ar ek enkawl dan		Atui awpna in ah eng darkar 12-



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	14 tal a in chhi tur a ni. • An ekna tur hmun chu cm 7.5 – 10 inkar vel a chhah tur a ni. • Thingzei nawi emaw buhpawl emaw badam kawr emaw tehi an ekna tur atan a phah theih a ni. • Heng buhpawl, thingzei nawi te hi hnawng reng a vawn theih nan chinai phul tur a ni.
	Natna thlengthei enkawl lawk dan	0-3 rd week	✚ Ranikhet Disease- Ar note an pian hlimin F₁ vaccine pek tur a nia an puitlin hunah R₂B pek leh tur a ni. ✚ B complex leh antibodies
		4 th weeks	✚ Coccidiosis- Amprolium emaw coccidiostat pek tur.
		4-5 th weeks	✚ Calcium tonic leh B₁₂
	Bacillary White Diarrhoea	Eng kum tan pawh	✚ Ar thi zawng zawng hal ral vak tur ✚ Furaldone 0.5g chu tui litre khat ah chawhpawlh a hman tur.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratanplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr Y. Ramakrishna	:	Farm manager (T-6)	ramakrishnaiari@rediffmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Dr. Lalmuanzovi	:	PC KVK Lunglei	kvklunglei@gmail.com kvknahtial@gmail.com
Mr. C. Lalthlamuana	:	PC KVK, Kolasib	kvkkolasib@gmail.com
Mrs. Lalnunpui Parte	:	PC KVK, Serchhip	Mmami997@yahoo.com kvkserchhip@gmail.com
Ms. Lalrinawnri Renthlei	:	PC KVK, Champhai	pckvkkhawzawl@rediffmail.com
Mr. Lalrosanga Khiantge	:	PC KVK, Lawngtlai	vvl9@rediffmail.com kvklawngtalai@rediffmail.com
Ms. C. Racheal	:	PC KVK, Saiha	kvksaiha@gmail.com rachoza@gmail.com
Mr. Vanlalhruaia Hnamte	:	PC KVK, Mamit	kvkmamit@yahoo.in
Dr. K. P. Chaudhary	:	PC KVK, Aizawl	Kpchy@rediffmail.com kvkaizawl@rediffmail.com



GRAMIN KRISHI MAUSAM SEWA
ICAR RESEARCH COMPLEX FOR NEH REGION
 Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Lawngtlai

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/English

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	26
Min Temp (°C)	10	10	11	11	11
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	95	95	96	96	96
Min RH (%)	35	32	40	43	54
Wind Speed (Kmph)	4	4	4	4	4
*Wind Direction	E	E	E	E	E

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
 Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- June 1-30, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 384.87mm (430.2mm)	Champhai- 105.48mm (359.89mm)	Saiha- 307.40 mm (507.7mm)	Kolasib- 236.00mm (428.1mm)
Lawngtlai-291.20mm (453.1mm)	Lunglei-326.00mm (465.14mm)	Mamit-204.87mm (442.80mm)	Serchhip-411.72mm (259.62mm)

Weather summary of the past three days

Maximum Tem. (°C):23-26°C
Minimum Tem. (°C): 8-11°C
Maximum RH (%):73-82%
Minimum RH (%):46-52%
Wind Direction: Northeasterly
Cloud cover: Mainly cloudy
Wind speed: 2 km/hr

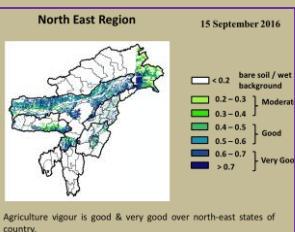
Rainfall: 00.0 mm

Weather forecast valid from 14th December, 2016 To 18th December, 2016.

There is no chance of rainfall during the next 5 days. The maximum and minimum temperatures for the next 5 days may range for 26-27°C and 10-11°C. Maximum relative humidity is expected in the range of 96-95% and minimum may from 32-54%. Wind direction would be easterly with the wind speed of 4 km per hour. Clear sky will prevail during the next five days.

Weekly cumulative rainfall: 00.0 mm

NDVI for Mizoram



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Main Crop / Animal / Fisheries	Stage	Cultural practices/ Pest/ Diseases	Agricultural / Horticultural/ animal husbandry advisories
Khasi Mandarin and acid lime	Harvesting stage	KOLASIB MAMIT AIZAWL	- Orange is picked when colour turn to dark green to pale yellow. - Mandarins and sweet oranges normally take 240-280 days to arrive at maturity. - Mature fruits at colour break stage are picked up in 2 - 3 intervals of 10-15 days. - Limes and lemons take 150-160 days for maturity. - There may be 2 or 3 crops in a year in limes and lemons. - The cold storage conditions for long term storage for different citrus fruits are available. - Oranges may be packed in well ventilated CFB boxes - 30 cm x 30 cm x 30 cm.
		Fruit fly	In large gardens apply carbaryl 0.2 per cent or malathion 0.15 per cent suspension containing sugar or jeggery at 10 g/l at fortnightly intervals at flowering and fruit initiation.
Banana	Harvesting stage	LUNGLEI LAWNGTLAI SAITAI	- Change of colour from green to yellowish. - Fingers are about three quarters full i.e. 3/4 of fruit is rounded - Ridges should still be prominent on the remaining quarter of the finger. - Harvest bananas when they are swollen and green but before they become ripe (plump and yellow). - Too early (when the bananas are thin and dark green). - Too late (when they are thick and turning yellow).
		Banana Rhizome weevil	Apply insecticide like imidacloprid 0.5 ml or phosolone 1.5 ml or acephate 1.0 g or dimethoate 2 ml /l at 50% egg hatching



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			stage when 1 st instars predominate which coincides with I Fortnight of July.
		Banana panama wilt	✚ Use disease free planting material. Roughing of infected plant and destroy them. Removing of excess male buds prevent disease spread. Disinfect the farm equipments.
		Banana beetle	✚ Removal of weeds from basin ✚ Removal of unwanted sucker ✚ Application of alphamethrin @ 0.01%.
Oil plam	Harvesting stage	AIZAWL	✚ Harvest only ripe fruit bunches and collect all loose fruit using high quality harvesting equipment. ✚ The oilplam will be ready for harvest ready for harvesting in 2.5 to 3 years after the plantation in the main field. ✚ Harvesting can be done when the fruit on plam turns into yellowish to orange colour. ✚ While harvesting a stalk length of 5 cm alone should be left. Harvesting should be done at 10-12 days interval. ✚ In young plantations, we get more bunches with less bunch weight and in adult plantations the bunch weight is more but the bunch number is less.
Tomato	Blight disease	LUNGLEI	✚ Prevailing weather may conducive for blight in Tomato. ✚ Cloudy and humid weather is most favorable for the disease. ✚ To manage the blight in tomato apply Ridomil or Indofil or Mancozeb @ 2 gm per liter of water.
Potato	Sowing stage	LAWNGTLAI	✚ Prepare the land for potato cultivation without any further delay. ✚ This may help to avoid some bacterial infection at growing stage. ✚ Land may be ploughed thoroughly for proper tillage. ✚ Seed must be treated before sowing. ✚ Light irrigation on every alternate day may be given for better establishment



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Early Cole crop	Black spot disease	KOLASIB	and smooth growth. - Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Prevailing weather may conducive for black spot disease in Cole Crops. - To manage the attack in leafy vegetables and Cole crops, Mancozeb @ 2gm per liter of water may be sprayed.
		MAMIT Cutworm AIZAWL	- Prevailing weather is conducive for the attack of cut worm which hide during day time in cracks of the soil and become active at dusk, feed on leave and cut the tender stem. - Apply cypermethrin or carbaryl 2 ml/lt of water or Tricel 1 ml/lt of water in evening every 10 days interval.
Onion	Nursery stage	Poly house LUNGLEI	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Mulching must be done after irrigation. - Spray Pendimethalin @ 3.5ml/lt of water in nursery which will give effective control of weed.
			- Seed treatment with thiram 3g/kg seed or Trichoderma viride 4g+ metalaxyl 4g (Apron)/ kg seed - Drenching 1% Bordeaux mixture or 2 g captan or 3 copper oxychloride/ lt of water at 10-15 DAS are effective.
French bean	Sowing stage	LAWNGTLAI SAIHA	- Variable, healthy, well mature and pure seeds should be sown. - Optimum spacing for pole type 60 cm X 30 cm. - Before sowing seed should be treated with Rhizobium vermicompost@10 t/ha.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Carrot and radish			- Carrots and radish are sown in raised beds having dimension of 1 metre breadth, any convenient length and raised from 15 to 30 cms. - In order to have an evenly sown crop the seeds are mixed with dry/ loose soil. - In this method the seeds are sown in lines with the help of a marker at a distance of 6 cms apart. - The seeds are then covered with loose and friable soil of about 2-4 cms again depending upon the rainfall and season. 90: 250: 130 Kg NPK will apply throughout the cropping season where whole quantity of Single Super Phosphate, Muriate of Potash and half the quantity of Urea is to be given as basal dose at the time of final preparation of the land.
Ginger and turmeric	Maturity stage		- Field must be inspected daily for disease appearance. - While inspecting, the healthy plants/plots must be marked and kept for planting in the next season. - Marking has to be done properly otherwise when plant matures and gets dried up, it will be very difficult to find out the marked plots.
Zero tillage pea and lentil cultivation in rice fellow	Sowing stage		- After harvesting of rice, pea and lentil will sow under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the rabi crops pea and lentil. - Pea and lentil will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 30 kg N, 60 kg



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			P ₂ O ₅ and 40 kg K ₂ O/ha will apply in furrows before sowing of lentil seeds and covered the seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Zero tillage toria cultivation in rice fellow	Sowing stage		- After harvesting of rice, toria under no-till system. - The rice fields will drain at physiological maturity (one week before harvesting) to get a suitable soil condition to cultivate the toria crops. - Toria crop will sow by opening a narrow furrow in between two rows of rice using a manual furrow opener. - A recommended dose of 50 kg N, 60 kg P₂O₅ and 40 kg K₂O/ha will apply in furrows before sowing of toria seeds. Half dose of nitrogen fertilizer along with full dose of phosphorus and potash will apply at the time of sowing. - Seed with soil and FYM mixture (2:1 ratio) to give a good seed-soil contact.
Soybean	Pod formation stage	Zero tillage	- Light irrigation on every alternate day may be given for better establishment and smooth growth. - Earthing up soil near to plant for better support.
Green gram, black gram and French bean (After Pre kharif rice harvest)	Vegetative stage	Zero tillage	- Clear base of the plant. - Earthing up soil near to plant for better support. - For French bean use bamboo for staking or support. - Use split dose of fertilizer for better fruiting for French bean.
Rabi Maize	Sowing stage		- Prepare the land for maize cultivation without any further delay. - This may help to avoid some cob borer infestation. - Seed is being placed in furrows. - Seed should be treated with Thiram @4 g/kg seed.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	- Use optimum seed rate (20-25 kg/ha) for desire plant population. - Apply well decomposed FYM @ 5-10 t/ha along with 80:60:40 kg N, P₂O₅ and K₂O/ha incorporate with soil before sowing. Half nitrogen dose will use at the time of sowing and remaining 25% after one month and 25% at flowering stage.
Pig	All stages	MAMIT AIZAWL	- As the weather gets colder, your pigs' energy requirement will increase, as they need more energy to keep warm. - Regularly monitor their level of 'fitness' and increase their feed intake to maintain. - Fish oils are excellent for providing slow-release energy with the added advantage of a high level of omega-3.
		Porcine Reproductive Respiratory Syndrome (PRRS).	1. Culling of positive pigs or piglets.
	Adult stage	Swine fever.	2. Vaccination of pigs with SF vaccines at 2 months and yearly interval/6 month interval
Cattle	All age group	LUNGLEI	Due to prolong dry spell there is a shortage of green grass in the field. For balanced diet and nutrition to your cattle, provide urea molasses treated paddy straw.
	All age group	Foot and Mouth Disease (FMD)	FMD vaccine at 16 week and repeat every 6 month.
	Young stage	Black Quarter (BQ)	- Black Quarter Vaccine (BQV). ❖ Primary vaccination 6 month or above ❖ Revaccination annually
Poultry	Litter management	LAWNGTLAI SAIHA	Birds require adequate space, sufficient feed to meet their nutritional requirements and an adequate supply of good-quality water.



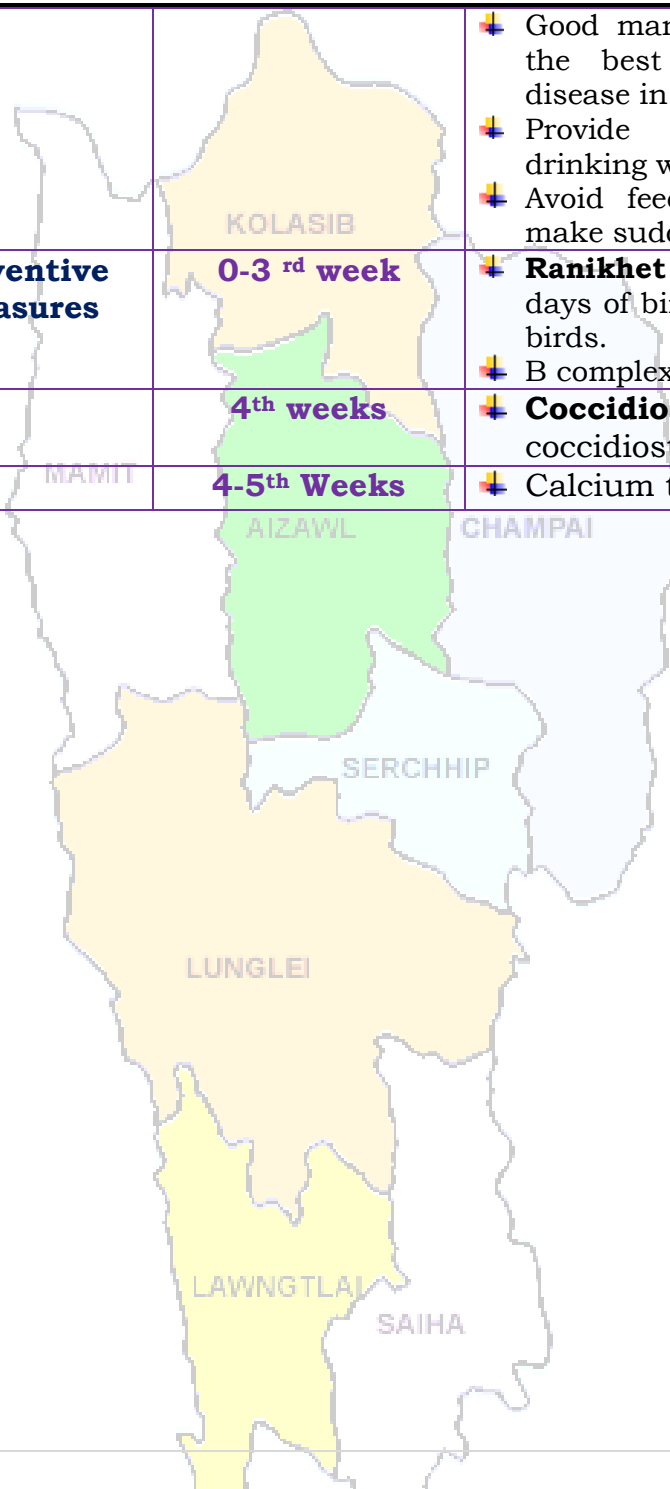
GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	- Good management and sanitation are the best ways to avoid infectious disease in poultry. - Provide ample quantity of clean drinking water. - Avoid feeding of mouldy feed. Don't make sudden changes in feed
	Preventive measures	0-3rd week	Ranikhet Disease- F1 vaccine at (1-6) days of birth and R₂B vaccine for adult birds. - B complex with antibodies
		4th weeks	Coccidiosis- Amprolium or coccidiostat
		4-5th Weeks	Calcium tonic fortified with B₁₂





GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratantplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr. M. Thoithoi Devi	:	Scientist (Agronomy)	thoiagri@gmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in
Mrs. Monika Bora	:	Meteorological Observer (IMD)	boramonika@rediffmail.com

Collaborating Department:

Name of the KVK	Programme Coordinator Name and Designation	KVK Email Id	Phone no/ Mobile no
KVK Lunglei	Dr. Lalmuanzovi Head & Sr. Scientist	kvkhnahthial@gmail.com	9862803750 9436154614
KVK, Kolasib	Mr. Lalrosamga Khiangte Head & Sr. Scientist	kvkkolasib@gmail.com	9436152440
KVK, Serchhip	Mr. K. Laltlanmawia Head & Sr. Scientist	kvkserchhip@gmail.com	9436146115 9615389293
KVK, Champhai	Mrs. Lalrinawmi Renthlei Head & Sr. Scientist	kvkchawzawl@gmail.com	9436159788
KVK, Lawngtlai	Dr. Michel Lallawmkimi Head & Sr. Scientist	kvklawntlai@gmail.com	9436155858
KVK, Saiha	Dr. Vanlalhruaia Hnampe Head & Sr. Scientist	kvksaiha@gmail.com	8974656509
KVK, Mamit	Dr. Samuel Lalliansanga Head & Sr. Scientist	kvkmamit@gmail.com	9436147625
KVK, Aizawl	Dr. K. P. Chaudhary Head & Sr. Scientist	Kpchy@rediffmail.com kvkaizawl@rediffmail.com	9436351669



GRAMIN KRISHI MAUSAM SEWA
ICAR RESEARCH COMPLEX FOR NEH REGION
 Mizoram Centre, Kolasib- 796081, MIZORAM
(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



District: Lawngtlai

Period: 14 December – 18 December, 2016

Bulletin No: - 661/2016/ Bulletin/Mizo

Date of issue: 13th December, 2016

Parameters	14.12.2016	15.12.2016	16.12.2016	17.12.2016	18.12.2016
Rainfall (mm)	0	0	0	0	0
Max Temp (°C)	26	26	26	27	26
Min Temp (°C)	10	10	11	11	11
Cloud Coverage	Clear sky	Clear sky	Clear sky	Clear sky	Clear sky
Max RH (%)	95	95	96	96	96
Min RH (%)	35	32	40	43	54
Wind Speed (Kmph)	4	4	4	4	4
*Wind Direction	E	E	E	E	E

**Northerly- N, North-Easterly- N-E, Easterly- E, South-Easterly- S-E,
 Southerly- S, South-Westerly- S-W, Westerly- W, North-westerly- N-W.**

STATUS OF MONSOON- May 1-31, 2016 (Percent of deviation from normal in parenthesis)

Aizawl- 383.68mm (341.8mm)	Champhai- 239.49mm (250.30mm)	Saiha- 109.52 mm (87.2mm)	Kolasib- 352.38mm (380.9mm)
Lawngtlai-321.51mm (285.5mm)	Lunglei-344.00mm (186.21mm)	Mamit-449.48mm (442.80mm)	Serchhip-411.72mm (259.63mm)

**Ni thum kalta sik leh sa
dinhmun tlangpui**

**14th December– 18th December, 2016
chhunga sik leh sa dinhmun tur tlangpui**

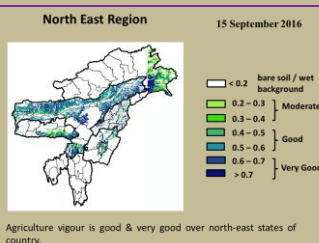
Maximum Tem. (°C):23-26°C
Minimum Tem. (°C): 8-11°C
Maximum RH (%):73-82%
Minimum RH (%):46-52%
Wind Direction: Northeasterly
Cloud cover: Mainly cloudy
Wind speed: 2 km/hr

Tun ni 5 chhung lo awm turah hian ruahtui tla miahlo tura beisei a ni. Khua a lum lai berin 26-27°C a ni ang a. A vawh lai ber in 10-11°C ni tura beisei a ni. RH san lai berin 96-95% leh a hniam lai berin 32-54% ni tur a rin niin. Thli hi darkar khatah 4 km vela chakin chhaklam awi zawngin a tleh rin a ni. A tlangpuiin tun ni nga chhung hian khawthiang tak hmuh beisei a ni.

Rainfall: 00.0 mm

Weekly cumulative rainfall: 00.0mm

***/NDVI for Mizoram**



Moderately wet mildly dry/mildly wet conditions



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



Thlai/ ran /sangha	Spat zawng	Hmalakna tur/ rannung leh natna hrik awm thei te	Agricultural/Horticultural/ animal husbandry atana thurawn
Khasi Mandarin leh acid lime	Seng (Harvesting) hun		- Serthlum rah chu a hringduk atanga rawng eng dala arawn inthlak hunah lawh tur a ni. - Mandarins leh sweet oranges te hian an puitlin nan ni 240-280 vel an mamawh. - A rah puitling tawhin a hmin rawng a rawn chhuah tan hunah lawh tur a ni a, ni 10-15 inkar danah wawi 2- 3 lawh tur a ni - Limes leh lemons hian puitlin nan ni 150-160 an mamawh. - Limes leh lemons te hi kum khatah wawi 2 emaw wawi 3 emaw an rah thei. - Rei tak dahthat theihna tur vur bawm (cold storage)changtlung tak ser rah chi hrang hrang tan a awm hrang vek bawk a ni. - Ser rah te chu boruak thianghlim luh theihna tur bawm (CFB Box) 30 cm x 30cm x 30 cm azau ah pack fel tur a ni.
		Ser rah bawmtu rannung thlawkthei (Fruitfly)	Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
Sapthei	Seng (Harvesting) hun		- A kung phun a nih atanga thla sawm hnu ah rah a pe chhuak tan a, chuan thla 16-18 a nih thlengin a rah chhunzawm ta thin a ni. - Rah hun bik hi tum hnih (2) a nei a chu chu August -



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			December leh March- May ah te an ni. - A rah hmin nan ni 80-85 vel a mamawh thin. - A rah rawn senduk (purple) toh chu a kuang tlem a zawng nen lawh tel tur a ni. - A rah seng tawh ho chu a pian hmang leh rihna te a tlakhniam hma in a rang lam a hralh zawh vat tur a ni. - A ro hnu in a kor te chu zur angin lang mahse a chhung lam erawh ni engemaw chen chu ala tha vek thung ang. - A kung a natna nei te chu lakkhawm a hal ral vek tur. - Huan zau deuh nei te tan carbaryl 0.2 per cent emaw Malathion 0.15 per cent ah Jegger 10 gram tui litre 1 a siam chu pawlh tur a ni a, chu mi chu a par lai leh rah a chhuah tirhin kar 2 danah zel spray tur a ni.
		Sapthei rah bawmtu rannung thlawkthei (Fruitfly)	
Balhla	Seng (Harvesting) hun		- A hring atanga a eng a a inthlak hunah . - A thlar a balhla ho hmun li a then a hmun thum an pum that a a bak zawngin kil anla neih lain. - Balhla hi anla puam a an hrin that lai mahse an hmin hma si in. - Balhla te an sin lai leh rawng hring duk anla nih lai chuan sengloh tur a ni. - Rawng eng an nih tawh chuan seng nan a tlai tawh tihna a ni.
		Balhla zung eichhetu rannung (Banana Rhizome)	Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		weevil)	tui chu rannung tui 50 per cent a keu hun velah kah tur a ni (July kar hmasa ber a ni tlangpui).
		Banana panama wilt	Natna kai lo chauh phun tur. Natna kai ho chu a zung nen kara paih tur. Farm-a hmanraw hrang hrangte natna hrik kai lo tura tihfai thin bawk tur a ni.
		Banana beetle	A bul vela hnim to tihfai tur A no rawn chawr thar mamawh loh te paih tur Alphamethrin 0.01 per cent hman tur
Oil palm	A rah insiam tan hunlai	AIZAWL CHAMPA SERCHHIP	A nu leh pa par hma lutuk te thenfai tur Heihian a kung a ti thag tha in zung a kaih ngheh tir bik thin a ni. Phun atanga thla 14-18 velah an par tlangpui A par nu leh pa hi a kung in vui a rawn chhuah tan tirh ah pawh phawi vat tur anni. Kut in emaw a pawhphawina hmanrua DOPR in ansiam hmangin awlsam takin a tih theih a ni. Hetiang a par nu leh pa lak hi kum hnih leh chanve atanga kum thum annih vel thlengin a tih zawm theih a ni.
		LUNGLEI LAWNGTLAI SAIHA	Thli leh rannung ten inthlahchhawanna kawngah an pui thin a, amaherawhchu thli hmanga inthlahchhawanna erawh hichuan a thawh hlawklo. Inthlahchhawn nan a rannung tangkai tak <i>Elaeidobius kamerunicus</i> hian a inthlahchhawanna ah leh a rah tur insiam kawngah a pui nasa hle a ni. Phun anih atanga kum hnih leh chanve hnu ah he rannung hi chhuah a tha a, kum thum hnu



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



			a a kung in a that puiloh anih chuan he rannung hi chhuah vek tur a ni.
Colocasia	A seng hun	KOLASIB	- A hnah te a eng (yellow) tan in a then an tla tan bawk a, chu chuan seng a hun a ni tih a lan tir. - Phun atanga thla 6-8 liam hnu ah seng theih a ni. - Seng dawnin uluk takin a zung nen phawi chhuah vek tur a ni. - Bal chu lahrangin ni hlimah pho hul tur a ni.
Tomato	A chi kui hun	A chi kuitiahna hmun tur siam dan	- Huan zawlah a chi thehna tur lei rihvum tur, ni hmuh thatna hmun ni bawk se. - A hmun chu a vang zawng metre khat a zau tur a ni a, a sei zawng chu mahni huan remchan ang tawk a siam mai tur a ni. - FYM hi metre square khatah kg 1.5 – 2.0 hman tur a ni. - A chi hi awmze nei taka ngil taka theh tur a ni a, an inkar hlat zawng hi 7-10 cm tur a ni.
		Nursery natna (Damping off)	A chi hi kg 1 ah thiram gram 3 emaw Trichoderma viride gram 4 leh metalaxyl gram 4 chawhpawlh a enkawl tur a ni.
Sawhthing leh Aieng	Par a chhuah hma	LAWNGTLAI SAIHA	- Thlai hnah, a tang ro leh hnim te chu paihfai vek tur. - Lin tirh (a to chhuah hma) in Atrazine (Atratraf 50wp, Gesaprim 500fw) 1.0-1.5kg a.i tui litre 600 ah pawlh tur a ni. Alachlor (Lasso) @2.25kga.i ha⁻¹ Metolachlor (Dual) @1.5-2.0 kg a.i ha⁻¹, Pendimethalin (Stomp) @ 1-1.5kg a.i ha⁻¹ te hian hnimhnah lian lampang chi a



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Turmeric shoot borer (Aieng kung ei chhetu ranning)	veng a ni. ✚ Ranning hlo imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1.0g emaw dimethoate 2ml emaw tui litre khatah pawlh a, hman tur a ni.
Kharif rice	A puitling hun/a vui insiam tan hun	KOLASIB	✚ A rawng chu a hring atangin gold rawngah a inthlak ang. ✚ Tui tling luan chhuahna tur mumal tak a sir kil khatah siam tur. ✚ A vui hmasa te tana harsatna awmlo tur in tui tling te chu paih chhuah vek tur.
		MAMIT	
		Sazu tihchhiat	✚ Sazu chhenna hmun tihchhiat leh fai taka buh hmun enkawl zir. ✚ Buh hmun leh achheh vel a awmhmun an khuar theihna tur atana hmanraw remchang hnimhna leh thlai ningnawi emaw buh bangnawi awmthei hrim hrim chu thenfai vek tur. ✚ Sazu in a a tihchhiat nasatna hmun ah chuan sazu hrai na tur 2 per cent Zinc phosphide (96 parts of broken rice + 2 parts of edible oil + 2 parts of 98% ZnP) hman tur a ni. ZNP tur (poison) hman hma in a thlem dan tur zir a enchhin hmasak phot tur a ni.
		AIZAWL	
		CHAMPAI	
		SERCHHIP	
		LUNGLEI	
		Sava tihchhiat	✚ Meithal chi hrim hrim eng pek chhuah pah a bengchheng siam thei hmanrua ✚ Balloon hampuar buh kunga tawnbeh hi sava hnawhbo nan senso hautaklo si a hman thin a ni. ✚ Lekhachhaih hi sava hlauh atan hman thin a ni bawk.
		LAWNGTLAI	
		SAIHA	



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		Rice yellow stem borer	- A hnah hmawr tan tur. - A kung hrisel lo lai paih tur - Tui litre khatah rannung hlo Imidacloprid 0.5ml emaw phosolone 1.5ml emaw acephate 1g emaw dimethoate 2ml emaw pawlh a, chu tui chu kah tur.
Bekang	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut thin tur.
Green gram, black gram leh French bean (nipui buh seng zawh hunah)	Par a chhuah hma	Zero tillage	- A kung bul leh a vel thenfai - A kung alo that a a zung in a thlawp that lehzuall nan a kung bul chawhphut rih vur thin tur. - French bean tan bik athlawp tu atan mau hman tur. - A rah athat lehzuall nan French bean tan bik chuan mumal takin a in henin leitha pek tur.
Vawk	Kumtluanin	Vawk natna	Vawkin heng natna chi hrang hrang nguina, che tha theilo, ek tang emaw kawthalo ang chi an lan tir a nih chuan ran doctor pan a rawn vat tur.
		Porcine Reproductive Respiratory Syndrome (PRRS).	1. A natna vei vawk te chu thah a phum tur a ni.
	A puitling hun	Swine fever.	2. Vawk thla hnih a nihin SF vaccine pek tur a ni a, he vaccine hi thla ruk emaw kumtluanin pek chhunzawm tur
Bawng	Kumtluanin	Foot and Mouth Disease (FMD)	Thla16 a upa an rih in FMD vaccine pek tur a nia, thla 6 danah pek chhunzawm tur a ni.
	A naupan lai	Black Quarter (BQ)	- Black Quarter Vaccine (BQ) - Thla ruk an tlin hunah vaccine lak tan tur. - Kumkhat hnu ah vaccine pek leh tur.
Ar	Ar ek enkawl dan		Atui awpna in ah eng darkar 12-



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD, Guwahati)



		KOLASIB	14 tal a in chhi tur a ni. • An ekna tur hmun chu cm 7.5 – 10 inkar vel a chhah tur a ni. • Thingzei nawi emaw buhpawl emaw badam kawr emaw tehi an ekna tur atan a phah theih a ni. • Heng buhpawl, thingzei nawi te hi hnawng reng a vawn theih nan chinai phul tur a ni.
	Natna thlengthei enkawl lawk dan	0-3 rd week	✚ Ranikhet Disease- Ar note an pian hlimin F₁ vaccine pek tur a nia an puitlin hunah R₂B pek leh tur a ni. ✚ B complex leh antibodies
		4 th weeks	✚ Coccidiosis- Amprolium emaw coccidiostat pek tur.
		4-5 th weeks	✚ Calcium tonic leh B₁₂
	Bacillary White Diarrhoea	Eng kum tan pawh	✚ Ar thi zawng zawng hal ral vak tur ✚ Furaldone 0.5g chu tui litre khat ah chawhpawlh a hman tur.



GRAMIN KRISHI MAUSAM SEWA ICAR RESEARCH COMPLEX FOR NEH REGION

Mizoram Centre, Kolasib- 796081, MIZORAM

(Prepared based on District wise Weather Forecast received from IMD,
Guwahati)



Expert committee members:

Dr. S.B. Singh	:	Joint Director	basantasinghsoibam@rediffmail.com
Dr. Saurav Saha	:	Scientist (Agril. Physics)	sauravs.saha@gmail.com
Dr. T. Boopathi	:	Scientist (Agril Entomology)	boopathiars@gmail.com
Dr. Sudip Kumar Dutta	:	Scientist (Hort.)	sudipiari@rediffmail.com
Dr. A. Ratankumar Singh	:	Scientist (Plant Pathology)	ratanplantpatho@gmail.com
Dr. L. H. Puui	:	Scientist (Vet. Microbiology)	lpuii@gmail.com
Dr. Lungmuana	:	Scientist (Soil Fertility)	lmsingson@gmail.com
Dr Y. Ramakrishna	:	Farm manager (T-6)	ramakrishnaiari@rediffmail.com
Mr. Samik Chowdhury	:	Technical Officer	samikchowdhury33@gmail.com
Mr. Evans Syiem	:	Meteorological Observer	evansmeteo@gmail.com
Mr. Vanthawmliana	:	Senior Research Fellow (Mizo language Translator)	Tom_tom79@yahoo.in

Collaborating Department:

Dr. Lalmuanzovi	:	PC KVK Lunglei	kvklunglei@gmail.com kvknahtial@gmail.com
Mr. C. Lalthlamuana	:	PC KVK, Kolasib	kvkkolasib@gmail.com
Mrs. Lalnunpui Parte	:	PC KVK, Serchhip	Mmami997@yahoo.com kvkserchhip@gmail.com
Ms. Lalrinawnri Renthlei	:	PC KVK, Champhai	pckvkkhawzawl@rediffmail.com
Mr. Lalrosanga Khiantge	:	PC KVK, Lawngtlai	vvl9@rediffmail.com kvklawngtalai@rediffmail.com
Ms. C. Racheal	:	PC KVK, Saiha	kvksaiha@gmail.com rachoza@gmail.com
Mr. Vanlalhruaia Hnamte	:	PC KVK, Mamit	kvkmamit@yahoo.in
Dr. K. P. Chaudhary	:	PC KVK, Aizawl	Kpchy@rediffmail.com kvkaizawl@rediffmail.com