

Manipur Centre, Lamphelpat, Imphal - 795 004

### "Gramin Krishi Mausam Seva"



#### **MANIPUR BULLETIN**

22<sup>nd</sup> December, 2017

### **Bishnupur**

GKMS at AMFU- Lamphelpat, ICAR-RC Manipur Centre in association with India Meteorological Department, Regional Meteorological Centre, Guwahati and India Meteorological Department, New Delhi, Ministry of Earth Science, Govt. of India reports the weather forecasts for the next five days, i.e., from 23<sup>rd</sup> to 27<sup>th</sup> December, 2017 as below:

Significant past weather for the preceding bi-weekly of
Imphal - West (19 <sup>th</sup> to 21 <sup>st</sup> December, 2017)

Observed clear to partly cloudy sky and foggy morning hours on  $19^{\text{th}}$  during past three days with **no** rainfall. Maximum temperature range of 21.7 to 23.2  $^{\circ}$  C and minimum temperature range of 8.8 to 10.0  $^{\circ}$  C with mean relative humidity 90 % max and 56.7 % min was recorded in the past three days.

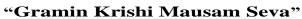
# Weather forecast for next five days of Bishnupur (23<sup>rd</sup> to 27<sup>th</sup> December, 2017)

litres of water. Also apply Dithane M 45 @ 2g/ litre of water.

Likely to have no rains upto Wednesday. Morning hours are likely to have moderate to dense fog and sky may remain mainly clear during afternoon hours. The maximum temp. 23 - 24  $^{\rm o}$  C & minimum temp. 9 - 10  $^{\rm o}$  C and relative humidity may reach up to 82 % (max RH) & 49 % (min RH). The average wind speed may be 0 - 4 km/hr.

Field Crops		T	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Rapeseed/ Mustard/	Vegetative		- Apply 75 litres @10g urea / 15 litres as foliar application after 30 days of sowing.
		Aphid	<ul> <li>- Use yellow plates for every 3 sq.m to attract the aphids or spray Pyrethrum @ 2ml/ litre of water on the infected patches.</li> <li>- Spray Cypermethrin @ 2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.</li> </ul>
		Hairy caterpillar	- Spray Chloropyriphos @ 2ml/litre of water on the infected patches only.
Lentil/ Blackgram (late variety)/	Vegetative	Aphid	- Spray Cypermethrin @2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.
Field Pea		Powdery mildew & Yellow rust	- Spray Bayleton @ 7 g/ 10 litres of water against powdery mildew and yellow rust especially to the crops grown in moist/ shady area.
Rabi Maize	Land preparation to sowing		<ul> <li>Land preparation for sowing rabi maize may be done.</li> <li>Rabi maize may be sown as intercrop with potato or pulses. 60cm width 40cm high ridges along east-west may be prepared after ploughing. Southern face may be sown with maize and northern with pea seeds.</li> </ul>
Seeds storage	Post harvest management		For seed purpose dry, clean and store the seeds in <i>RC-seed bins</i> after proper drying of seeds along with charcoal at 80:20. Check for moisture content or weight of charcoal and dry if required.  For grains, store grains in well ventilated godowns after drying proper. Spray Malathion 1% on the walls of stores.
Horticulture Crops			
* Regular monitoring	g may be done for in	sect pest infestation.	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Cabbage/ Cauliflower/	Vegetative	Aphid	- If Infestation of aphid is less, drench the plant with strong sprays of water to remove aphid/ or remove infected plant part. But if the infestation is severe, spray evenly insecticidal soap or neem oil.
Tomato/ Potato		leaf eating caterpillar	- Spray Flubendiamide (Fame) @ 2ml/ 10 lit of water.
Cucurbits	Seed collection		- Procure good quality seeds from reliable source that is suitable to the location. Preparation for raising nurseries of cucurbits like water-melon, cucumber, sponge gourd, pumpkin, etc. in poly-pouch and trays may be done under polyhouse.
Tomato	Vegetative	Early blight	- Apply Dichlorovos @ 0.5ml/ litre of water or Imidachlorpid @ 2ml/ 5







Onion	Vegetative		- Apply 64kg Urea, 44kg DAP and 34 kg MOP per sangam as basal dose followed by 64kg urea/ sangam after 30-35 days after transplanting.
Cole crops	Nursery rais	sing	- Nursery for late crops may be raised.
Coriander/ Onion/ Garlic	Vegetative		- Avoid water logging in and around the crop field.
Animal Science		<del></del>	
Name of	Stage	Disease and	Agro-meteorological advisories
bird/ animal	A 11	Management	
Poultry (Chicken//	All age groups	Management	Protect animals/ birds from sudden drop in temperature. Cover the well with bassian electr/polythone sheet during night time.
Duck)			<ul><li>wall with hessian cloth/ polythene sheet during night time.</li><li>Litter must be stirred frequently and aired every day.</li></ul>
Sheep/ Goat	All age groups	Vaccination	• If the animals have not been vaccinated against F.M.D., B.Q., H.S.,
Sheep/ Goat	An age groups	Vaccination	Enterotoxaemia, etc. this must be done during this month.
			Take adequate care to prevent occurrence of Mastitis.
			<ul> <li>PPR immunization must be done once in every three years.</li> </ul>
		• De-worming	• Administer Tolzan-F @ 2.5ml orally/ 50kg b. wt.
		• Shearing for wool	Sheep should be sheared during this month.
Pig	All age groups	Coccidial infection	• Ofloxacine/ Ornidazole (O <sub>2</sub> ) tab twice daily for 5 days.
8	except the young	• De-worming	De-worm with Albendazole @7.5 mg/kg b.wt.
	ones	Vaccination	Vaccinate against FMD.
		• Skin disease	Sprayer of Anti- <i>Psoroptic</i> may be used
	All age groups	Vaccination	Vaccinate against B.Q., F.M.D. & H.S. if not yet vaccinated.
Cattle	excepts the	Vaccination	Cases of H.S. may be encountered during this period
Cattle	young ones		Immediate treatment using appropriate drugs with the help of
	Je mag asses		Consultant must be advocated to safe the animals.
		Deworming	De-worm with Albomac suspension@60-90ml for 300kg body weight
		20 Worming	or 20-30ml for 100 kg body weight.
		• Care & Management	Mixture of mineral/ salts should be added in the feed.
			• Avoid the cattle from chiting/biting by Flies
			Adopt tick control measures
		Mastitis	• Adequate care must be ensured for prevention of mastitis for the milch animals.
• Fodder cultiv	vation: Oat crop may	be sown immediately.	
Fishery:	•	<u>*</u>	
Type of Farming	Stage	Management	Agro-metrological advisories
	Grow-out		- Lime/ Aqua magic should be applied regularly to keep good quality pond water. Water depth should be maintained at 1.0-1.5m.
		Pond water	- Replace half of pond water with fresh & clean water at every 25-30
Carp culture			days interval.
- F Sarrar			- Minimum feed must be provided, i.e., @ 1-2% of body weight per day.
		Harvest	- As per market demand harvesting may be started.
		Feeding	- Feeds should be provided 2 times a day.



Manipur Centre, Lamphelpat, Imphal - 795 004





#### **MANIPUR BULLETIN**

22<sup>nd</sup> December, 2017

### **Chandel**

GKMS at AMFU- Lamphelpat, ICAR-RC Manipur Centre in association with India Meteorological Department, Regional Meteorological Centre, Guwahati and India Meteorological Department, New Delhi, Ministry of Earth Science, Govt. of India reports the weather forecasts for the next five days, i.e., from 23<sup>rd</sup> to 27<sup>th</sup> December, 2017 as below:

Significant past weather for the preceding bi-weekly of	Ĉ
Imphal - West (19 <sup>th</sup> to 21 <sup>st</sup> December, 2017)	

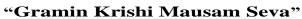
Observed clear to partly cloudy sky and foggy morning hours on  $19^{th}$  during past three days with  ${\bf no}$  rainfall. Maximum temperature range of 21.7 to 23.2  $^{\circ}$  C and minimum temperature range of 8.8 to 10.0  $^{\circ}$  C with mean relative humidity 90 % max and 56.7 % min was recorded in the past three days.

# Weather forecast for next five days of Chandel (23<sup>rd</sup> to 27<sup>th</sup> December, 2017)

Likely to have no rains upto Wednesday. Morning hours are likely to have moderate to dense fog and sky may remain mainly clear during afternoon hours. The maximum temp. 21 - 22  $^{\circ}$  C & minimum temp. 7 - 8  $^{\circ}$  C and relative humidity may reach up to 90 % (max RH) & 54 % (min RH). The average wind speed may be 3 km/hr.

Field Crops					
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories		
Rapeseed/ Mustard/	Vegetative		- Apply 75 litres @10g urea / 15 litres as foliar application after 30 days of sowing.		
		Aphid	<ul> <li>- Use yellow plates for every 3 sq.m to attract the aphids or spray Pyrethrum @ 2ml/ litre of water on the infected patches.</li> <li>- Spray Cypermethrin @ 2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.</li> </ul>		
		Hairy caterpillar	- Spray Chloropyriphos @ 2ml/litre of water on the infected patches only.		
Lentil/ Blackgram (late variety)/	Vegetative	Aphid	- Spray Cypermethrin @2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.		
Field Pea		Powdery mildew & Yellow rust	- Spray Bayleton @ 7 g/ 10 litres of water against powdery mildew and yellow rust especially to the crops grown in moist/ shady area.		
Rabi Maize	Land preparation to sowing		- Land preparation for sowing rabi maize may be done Rabi maize may be sown as intercrop with potato or pulses. 60cm width 40cm high ridges along east-west may be prepared after ploughing. Southern face may be sown with maize and northern with pea seeds.		
Seeds storage	Post harvest management		For seed purpose dry, clean and store the seeds in <i>RC-seed bins</i> after proper drying of seeds along with charcoal at 80:20. Check for moisture content or weight of charcoal and dry if required.  For grains, store grains in well ventilated godowns after drying proper. Spray Malathion 1% on the walls of stores.		
Horticulture Crops					
* Regular monitoring	may be done for in	sect pest infestation.			
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories		
Cabbage/ Cauliflower/ Tomato/ Potato	Vegetative	Aphid  leaf eating caterpillar	<ul> <li>- If Infestation of aphid is less, drench the plant with strong sprays of water to remove aphid/ or remove infected plant part. But if the infestation is severe, spray evenly insecticidal soap or neem oil.</li> <li>- Spray Flubendiamide (Fame) @ 2ml/ 10 lit of water.</li> </ul>		
Cucurbits	Seed collection		- Procure good quality seeds from reliable source that is suitable to the location. Preparation for raising nurseries of cucurbits like water-melon, cucumber, sponge gourd, pumpkin, etc. in poly-pouch and trays may be done under polyhouse.		
Tomato	Vegetative	Early blight	- Apply Dichlorovos @ 0.5ml/ litre of water or Imidachlorpid @ 2ml/ 5 litres of water. Also apply Dithane M 45 @ 2g/ litre of water.		







Onion	Vegetative		- Apply 64kg Urea, 44kg DAP and 34 kg MOP per sangam as basal dose followed by 64kg urea/ sangam after 30-35 days after transplanting.
Cole crops	Nursery rais	sing	- Nursery for late crops may be raised.
Coriander/ Onion/ Garlic	Vegetative		- Avoid water logging in and around the crop field.
Animal Science		<del></del>	
Name of	Stage	Disease and	Agro-meteorological advisories
bird/ animal	A 11	Management	
Poultry (Chicken//	All age groups	Management	Protect animals/ birds from sudden drop in temperature. Cover the well with bassian electr/polythone sheet during night time.
Duck)			<ul><li>wall with hessian cloth/ polythene sheet during night time.</li><li>Litter must be stirred frequently and aired every day.</li></ul>
Sheep/ Goat	All age groups	Vaccination	• If the animals have not been vaccinated against F.M.D., B.Q., H.S.,
Sheep/ Goat	An age groups	Vaccination	Enterotoxaemia, etc. this must be done during this month.
			Take adequate care to prevent occurrence of Mastitis.
			<ul> <li>PPR immunization must be done once in every three years.</li> </ul>
		• De-worming	• Administer Tolzan-F @ 2.5ml orally/ 50kg b. wt.
		• Shearing for wool	Sheep should be sheared during this month.
Pig	All age groups	Coccidial infection	• Ofloxacine/ Ornidazole (O <sub>2</sub> ) tab twice daily for 5 days.
8	except the young	• De-worming	De-worm with Albendazole @7.5 mg/kg b.wt.
	ones	Vaccination	Vaccinate against FMD.
		• Skin disease	Sprayer of Anti- <i>Psoroptic</i> may be used
	All age groups	Vaccination	Vaccinate against B.Q., F.M.D. & H.S. if not yet vaccinated.
Cattle	excepts the	Vaccination	Cases of H.S. may be encountered during this period
Cattle	young ones		Immediate treatment using appropriate drugs with the help of
	Je mag asses		Consultant must be advocated to safe the animals.
		Deworming	De-worm with Albomac suspension@60-90ml for 300kg body weight
		20 Worming	or 20-30ml for 100 kg body weight.
		• Care & Management	Mixture of mineral/ salts should be added in the feed.
			• Avoid the cattle from chiting/biting by Flies
			Adopt tick control measures
		Mastitis	• Adequate care must be ensured for prevention of mastitis for the milch animals.
• Fodder cultiv	vation: Oat crop may	be sown immediately.	
Fishery:	•	<u>*</u>	
Type of Farming	Stage	Management	Agro-metrological advisories
	Grow-out		- Lime/ Aqua magic should be applied regularly to keep good quality pond water. Water depth should be maintained at 1.0-1.5m.
		Pond water	- Replace half of pond water with fresh & clean water at every 25-30
Carp culture			days interval.
- F Sarrar			- Minimum feed must be provided, i.e., @ 1-2% of body weight per day.
		Harvest	- As per market demand harvesting may be started.
		Feeding	- Feeds should be provided 2 times a day.



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#### "Gramin Krishi Mausam Seva"



#### **MANIPUR BULLETIN**

22<sup>nd</sup> December, 2017

#### **Churachandpur**

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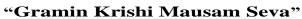
# Weather forecast for next five days of Churachandpur (23<sup>rd</sup> to 27<sup>th</sup> December, 2017)

litres of water. Also apply Dithane M 45 @ 2g/ litre of water.

Likely to have no rains upto Wednesday. Morning hours are likely to have moderate to dense fog and sky may remain mainly clear during afternoon hours. The maximum temp. 23 - 24  $^{\rm o}$  C & minimum temp. 9 - 10  $^{\rm o}$  C and relative humidity may reach up to 85 % (max RH) & 49 % (min RH). The average wind speed may be 0-4 km/hr.

Field Crops		T	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Rapeseed/ Mustard/	Vegetative		- Apply 75 litres @10g urea / 15 litres as foliar application after 30 days of sowing.
		Aphid	<ul> <li>- Use yellow plates for every 3 sq.m to attract the aphids or spray Pyrethrum @ 2ml/ litre of water on the infected patches.</li> <li>- Spray Cypermethrin @ 2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.</li> </ul>
		Hairy caterpillar	- Spray Chloropyriphos @ 2ml/litre of water on the infected patches only.
Lentil/ Blackgram (late variety)/	Vegetative	Aphid	- Spray Cypermethrin @2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.
Field Pea		Powdery mildew & Yellow rust	- Spray Bayleton @ 7 g/ 10 litres of water against powdery mildew and yellow rust especially to the crops grown in moist/ shady area.
Rabi Maize	Land preparation to sowing		<ul> <li>Land preparation for sowing rabi maize may be done.</li> <li>Rabi maize may be sown as intercrop with potato or pulses. 60cm width 40cm high ridges along east-west may be prepared after ploughing. Southern face may be sown with maize and northern with pea seeds.</li> </ul>
Seeds storage	Post harvest management		For seed purpose dry, clean and store the seeds in <i>RC-seed bins</i> after proper drying of seeds along with charcoal at 80:20. Check for moisture content or weight of charcoal and dry if required.  For grains, store grains in well ventilated godowns after drying proper. Spray Malathion 1% on the walls of stores.
Horticulture Crops			
* Regular monitoring	g may be done for in	sect pest infestation.	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Cabbage/ Cauliflower/	Vegetative	Aphid	- If Infestation of aphid is less, drench the plant with strong sprays of water to remove aphid/ or remove infected plant part. But if the infestation is severe, spray evenly insecticidal soap or neem oil.
Tomato/ Potato		leaf eating caterpillar	- Spray Flubendiamide (Fame) @ 2ml/ 10 lit of water.
Cucurbits	Seed collection		- Procure good quality seeds from reliable source that is suitable to the location. Preparation for raising nurseries of cucurbits like water-melon, cucumber, sponge gourd, pumpkin, etc. in poly-pouch and trays may be done under polyhouse.
Tomato	Vegetative	Early blight	- Apply Dichlorovos @ 0.5ml/ litre of water or Imidachlorpid @ 2ml/ 5







Onion	Vegetative		- Apply 64kg Urea, 44kg DAP and 34 kg MOP per sangam as basal dose followed by 64kg urea/ sangam after 30-35 days after transplanting.
Cole crops	Nursery rais	sing	- Nursery for late crops may be raised.
Coriander/ Onion/ Garlic	Vegetative		- Avoid water logging in and around the crop field.
Animal Science		<del></del>	
Name of	Stage	Disease and	Agro-meteorological advisories
bird/ animal	A 11	Management	
Poultry (Chicken//	All age groups	Management	Protect animals/ birds from sudden drop in temperature. Cover the well with bassian electr/polythone sheet during night time.
Duck)			<ul><li>wall with hessian cloth/ polythene sheet during night time.</li><li>Litter must be stirred frequently and aired every day.</li></ul>
Sheep/ Goat	All age groups	Vaccination	• If the animals have not been vaccinated against F.M.D., B.Q., H.S.,
Sheep/ Goat	An age groups	Vaccination	Enterotoxaemia, etc. this must be done during this month.
			Take adequate care to prevent occurrence of Mastitis.
			<ul> <li>PPR immunization must be done once in every three years.</li> </ul>
		• De-worming	• Administer Tolzan-F @ 2.5ml orally/ 50kg b. wt.
		• Shearing for wool	Sheep should be sheared during this month.
Pig	All age groups	Coccidial infection	• Ofloxacine/ Ornidazole (O <sub>2</sub> ) tab twice daily for 5 days.
8	except the young	• De-worming	De-worm with Albendazole @7.5 mg/kg b.wt.
	ones	Vaccination	Vaccinate against FMD.
		• Skin disease	Sprayer of Anti- <i>Psoroptic</i> may be used
	All age groups	Vaccination	Vaccinate against B.Q., F.M.D. & H.S. if not yet vaccinated.
Cattle	excepts the	Vaccination	Cases of H.S. may be encountered during this period
Cattle	young ones		Immediate treatment using appropriate drugs with the help of
	Je mag asses		Consultant must be advocated to safe the animals.
		Deworming	De-worm with Albomac suspension@60-90ml for 300kg body weight
		20 Worming	or 20-30ml for 100 kg body weight.
		• Care & Management	Mixture of mineral/ salts should be added in the feed.
			• Avoid the cattle from chiting/biting by Flies
			Adopt tick control measures
		Mastitis	• Adequate care must be ensured for prevention of mastitis for the milch animals.
• Fodder cultiv	vation: Oat crop may	be sown immediately.	
Fishery:	•	<u>*</u>	
Type of Farming	Stage	Management	Agro-metrological advisories
	Grow-out		- Lime/ Aqua magic should be applied regularly to keep good quality pond water. Water depth should be maintained at 1.0-1.5m.
		Pond water	- Replace half of pond water with fresh & clean water at every 25-30
Carp culture			days interval.
- F Sarrar			- Minimum feed must be provided, i.e., @ 1-2% of body weight per day.
		Harvest	- As per market demand harvesting may be started.
		Feeding	- Feeds should be provided 2 times a day.



**Onion/ Garlic** 

#### ICAR Research Complex for N.E.H. Region

Manipur Centre, Lamphelpat, Imphal - 795 004





#### MANIPUR BULLETIN

22<sup>nd</sup> December, 2017

### **Senapati**

GKMS at AMFU- Lamphelpat, ICAR-RC Manipur Centre in association with India Meteorological Department, Regional Meteorological Centre, Guwahati and India Meteorological Department, New Delhi, Ministry of Earth Science, Govt. of India reports the weather forecasts for the next five days, i.e., from 23<sup>rd</sup> to 27<sup>th</sup> December, 2017 as below:

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Imphal - West (19 <sup>th</sup> to 21 <sup>st</sup> December, 2017)

Observed clear to partly cloudy sky and foggy morning hours on  $19^{\text{th}}$  during past three days with **no** rainfall. Maximum temperature range of 21.7 to 23.2  $^{\circ}$  C and minimum temperature range of 8.8 to 10.0  $^{\circ}$  C with mean relative humidity 90 % max and 56.7 % min was recorded in the past three days.

# Weather forecast for next five days of Senapati (23<sup>rd</sup> to 27<sup>th</sup> December, 2017)

Likely to have no rains upto Wednesday. Morning hours are likely to have moderate to dense fog and sky may remain mainly clear during afternoon hours. The maximum temp. 19 - 20  $^{\rm o}$  C & minimum temp. 6 - 7  $^{\rm o}$  C and relative humidity may reach up to 84 % (max RH) & 46 % (min RH). The average wind speed may be 3 - 4 km/hr.

Field Crops			
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
			- Apply 75 litres @10g urea / 15 litres as foliar application after 30 days of sowing.
		Aphid	- Use yellow plates for every 3 sq.m to attract the aphids or spray
Rapeseed/			Pyrethrum @ 2ml/ litre of water on the infected patches.
Mustard/	Vegetative		- Spray Cypermethrin @ 2ml/lit of water or Nuvan @ 0.5ml/ lit of water
			against aphid. For organic control against aphid, sprays that consist of
		**	Azadirachtin, neem oil or Pyrethrin may be used.
		Hairy caterpillar	- Spray Chloropyriphos @ 2ml/litre of water on the infected patches
			only.
		Aphid	- Spray Cypermethrin @2ml/lit of water or Nuvan @ 0.5ml/ lit of water
Lentil/ Blackgram			against aphid. For organic control against aphid, sprays that consist of
(late variety)/	Vegetative		Azadirachtin, neem oil or Pyrethrin may be used.
Field Pea		Powdery mildew	- Spray Bayleton @ 7 g/ 10 litres of water against powdery mildew and
		& Yellow rust	yellow rust especially to the crops grown in moist/ shady area.
			- Land preparation for sowing rabi maize may be done.
D 1115	Land		- Rabi maize may be sown as intercrop with potato or pulses. 60cm
Rabi Maize	preparation to		width 40cm high ridges along east-west may be prepared after
	sowing		ploughing. Southern face may be sown with maize and northern with pea
			seeds.
			For seed purpose dry, clean and store the seeds in <i>RC-seed bins</i> after
G 1 4	Post harvest		proper drying of seeds along with charcoal at 80:20. Check for moisture
Seeds storage	management		content or weight of charcoal and dry if required.
			For grains, store grains in well ventilated godowns after drying proper.
H			Spray Malathion 1% on the walls of stores.
* Regular monitoring	l d f:		
Name of the crop	<del></del>		A cue meteoralecical e deixeries
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories  - If Infestation of aphid is less, drench the plant with strong sprays of
		Aphid	
Cabbage/			water to remove aphid/ or remove infected plant part. But if the
Cauliflower/ Tomato/ Potato	Vegetative	1	infestation is severe, spray evenly insecticidal soap or neem oil.
		leaf eating	- Spray Flubendiamide (Fame) @ 2ml/ 10 lit of water.
		caterpillar	
Onion	Vegetative		- Apply 64kg Urea, 44kg DAP and 34 kg MOP per sangam as basal dose
Ollion	Vegetative		followed by 64kg urea/ sangam after 30-35 days after transplanting.
Cole crops	Nursery raising		- Nursery for late crops may be raised.
Coriander/ Onion/ Garlic	Vegetative		- Avoid water logging in and around the crop field.



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Animal Science	es		
Name of	Stage	Disease and	Agro-meteorological advisories
bird/ animal		Management	
Poultry	All age groups	<ul> <li>Management</li> </ul>	• Protect animals/ birds from sudden drop in temperature. Cover the
(Chicken//			wall with hessian cloth/ polythene sheet during night time.
Duck)			Litter must be stirred frequently and aired every day.
Sheep/ Goat	All age groups	<ul> <li>Vaccination</li> </ul>	• If the animals have not been vaccinated against F.M.D., B.Q., H.S.,
			Enterotoxaemia, etc. this must be done during this month.
			• Take adequate care to prevent occurrence of Mastitis.
			PPR immunization must be done once in every three years.
		De-worming	• Administer Tolzan-F @ 2.5ml orally/ 50kg b. wt.
		Shearing for wool	• Sheep should be sheared during this month.
Pig	All age groups	<ul> <li>Coccidial infection</li> </ul>	• Ofloxacine/ Ornidazole (O <sub>2</sub> ) tab twice daily for 5 days.
	except the young	• De-worming	• De-worm with Albendazole @7.5 mg/kg b.wt.
	ones	Vaccination	Vaccinate against FMD.
		Skin disease	• Sprayer of Anti- <i>Psoroptic</i> may be used
	All age groups	Vaccination	Vaccinate against B.Q., F.M.D. & H.S. if not yet vaccinated.
Cattle	excepts the young ones		• Cases of H.S. may be encountered during this period
			• Immediate treatment using appropriate drugs with the help of
			Consultant must be advocated to safe the animals.
		Deworming	• De-worm with Albomac suspension@60-90ml for 300kg body weight or 20-30ml for 100 kg body weight.
		Care & Management	Mixture of mineral/ salts should be added in the feed.
			<ul> <li>Avoid the cattle from chiting/biting by Flies</li> </ul>
			Adopt tick control measures
		Mastitis	• Adequate care must be ensured for prevention of mastitis for the milch
			animals.
	ation: Oat crop may	be sown immediately.	
Fishery:			
Type of	Stage	Management	Agro-metrological advisories
Farming			
Commonltone			- Lime/ Aqua magic should be applied regularly to keep good quality
	Grow-out	Pond water	pond water. Water depth should be maintained at 1.0-1.5m Replace half of pond water with fresh & clean water at every 25-30
		rond water	days interval.
Carp culture			- Minimum feed must be provided, i.e., @ 1-2% of body weight per day.
		Harvest	- As per market demand harvesting may be started.
		Feeding	- Feeds should be provided 2 times a day.
		reeding	- reeds should be provided 2 times a day.

(I. Meghachandra Singh) Scientist i/c, GKMS



Manipur Centre, Lamphelpat, Imphal - 795 004

#### "Gramin Krishi Mausam Seva"



#### **MANIPUR BULLETIN**

22<sup>nd</sup> December, 2017

### **Tamenglong**

GKMS at AMFU- Lamphelpat, ICAR-RC Manipur Centre in association with India Meteorological Department, Regional Meteorological Centre, Guwahati and India Meteorological Department, New Delhi, Ministry of Earth Science, Govt. of India reports the weather forecasts for the next five days, i.e., from 23<sup>rd</sup> to 27<sup>th</sup> December, 2017 as below:

# Significant past weather for the preceding bi-weekly of Imphal - West $(19^{th}$ to $21^{st}$ December, 2017)

Observed clear to partly cloudy sky and foggy morning hours on  $19^{th}$  during past three days with  ${\bf no}$  rainfall. Maximum temperature range of 21.7 to 23.2  $^{\circ}$  C and minimum temperature range of 8.8 to 10.0  $^{\circ}$  C with mean relative humidity 90 % max and 56.7 % min was recorded in the past three days.

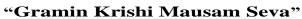
# Weather forecast for next five days of Tamenglong (23<sup>rd</sup> to 27<sup>th</sup> December, 2017)

litres of water. Also apply Dithane M 45 @ 2g/litre of water.

Likely to have no rains upto Wednesday. Morning hours are likely to have moderate to dense fog and sky may remain mainly clear during afternoon hours. The maximum temp. 19 - 20  $^{\rm o}$  C & minimum temp. 6 - 7  $^{\rm o}$  C and relative humidity may reach up to 84 % (max RH) & 46 % (min RH). The average wind speed may be 3 - 4 km/hr.

Field Crops Name of the crop	Stage	Pest and disease	A ano motognological advisories
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories  - Apply 75 litres @10g urea / 15 litres as foliar application after 30 days of solving
Rapeseed/ Mustard/	Vegetative	Aphid	of sowing.  - Use yellow plates for every 3 sq.m to attract the aphids or spray Pyrethrum @ 2ml/ litre of water on the infected patches.  - Spray Cypermethrin @ 2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.
		Hairy caterpillar	- Spray Chloropyriphos @ 2ml/litre of water on the infected patches only.
Lentil/ Blackgram (late variety)/	Vegetative	Aphid	- Spray Cypermethrin @2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.
Field Pea		Powdery mildew & Yellow rust	- Spray Bayleton @ 7 g/ 10 litres of water against powdery mildew and yellow rust especially to the crops grown in moist/ shady area.
Rabi Maize	Land preparation to sowing		<ul> <li>- Land preparation for sowing rabi maize may be done.</li> <li>- Rabi maize may be sown as intercrop with potato or pulses. 60cm width 40cm high ridges along east-west may be prepared after ploughing. Southern face may be sown with maize and northern with pea seeds.</li> </ul>
Seeds storage	Post harvest management		For seed purpose dry, clean and store the seeds in <i>RC-seed bins</i> after proper drying of seeds along with charcoal at 80:20. Check for moisture content or weight of charcoal and dry if required.  For grains, store grains in well ventilated godowns after drying proper. Spray Malathion 1% on the walls of stores.
Horticulture Crops	1	1	
* Regular monitoring	•		
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Cabbage/ Cauliflower/ Tomato/ Potato	Vegetative	Aphid leaf eating	<ul> <li>If Infestation of aphid is less, drench the plant with strong sprays of water to remove aphid/ or remove infected plant part. But if the infestation is severe, spray evenly insecticidal soap or neem oil.</li> <li>Spray Flubendiamide (Fame) @ 2ml/ 10 lit of water.</li> </ul>
Tomato/Totato		caterpillar	Spray Fracendiamide (Fame) & 2mil 10 m of water.
Cucurbits	Seed collection		- Procure good quality seeds from reliable source that is suitable to the location. Preparation for raising nurseries of cucurbits like water-melon, cucumber, sponge gourd, pumpkin, etc. in poly-pouch and trays may be done under polyhouse.
Tomato	Vegetative	Early blight	- Apply Dichlorovos @ 0.5ml/ litre of water or Imidachlorpid @ 2ml/ 5







Onion	Vegetative		- Apply 64kg Urea, 44kg DAP and 34 kg MOP per sangam as basal dose followed by 64kg urea/ sangam after 30-35 days after transplanting.
Cole crops	Nursery rais	sing	- Nursery for late crops may be raised.
Coriander/ Onion/ Garlic	Vegetative		- Avoid water logging in and around the crop field.
Animal Science		<del></del>	
Name of	Stage	Disease and	Agro-meteorological advisories
bird/ animal	A 11	Management	
Poultry (Chicken//	All age groups	Management	Protect animals/ birds from sudden drop in temperature. Cover the well with bassian electr/polythone sheet during night time.
Duck)			<ul><li>wall with hessian cloth/ polythene sheet during night time.</li><li>Litter must be stirred frequently and aired every day.</li></ul>
Sheep/ Goat	All age groups	Vaccination	• If the animals have not been vaccinated against F.M.D., B.Q., H.S.,
Sheep/ Goat	An age groups	Vaccination	Enterotoxaemia, etc. this must be done during this month.
			Take adequate care to prevent occurrence of Mastitis.
			<ul> <li>PPR immunization must be done once in every three years.</li> </ul>
		• De-worming	• Administer Tolzan-F @ 2.5ml orally/ 50kg b. wt.
		• Shearing for wool	Sheep should be sheared during this month.
Pig	All age groups	Coccidial infection	• Ofloxacine/ Ornidazole (O <sub>2</sub> ) tab twice daily for 5 days.
8	except the young	• De-worming	De-worm with Albendazole @7.5 mg/kg b.wt.
	ones	Vaccination	Vaccinate against FMD.
		• Skin disease	Sprayer of Anti- <i>Psoroptic</i> may be used
	All age groups	Vaccination	Vaccinate against B.Q., F.M.D. & H.S. if not yet vaccinated.
Cattle	excepts the	Vaccination	Cases of H.S. may be encountered during this period
Cattle	young ones		Immediate treatment using appropriate drugs with the help of
	Je mag asses		Consultant must be advocated to safe the animals.
		Deworming	De-worm with Albomac suspension@60-90ml for 300kg body weight
		20 Worming	or 20-30ml for 100 kg body weight.
		• Care & Management	Mixture of mineral/ salts should be added in the feed.
			• Avoid the cattle from chiting/biting by Flies
			Adopt tick control measures
		Mastitis	• Adequate care must be ensured for prevention of mastitis for the milch animals.
• Fodder cultiv	vation: Oat crop may	be sown immediately.	
Fishery:	•	<u>*</u>	
Type of Farming	Stage	Management	Agro-metrological advisories
			- Lime/ Aqua magic should be applied regularly to keep good quality pond water. Water depth should be maintained at 1.0-1.5m.
		Pond water	- Replace half of pond water with fresh & clean water at every 25-30
Carp culture	Grow-out		days interval.
- F Sarrar			- Minimum feed must be provided, i.e., @ 1-2% of body weight per day.
		Harvest	- As per market demand harvesting may be started.
		Feeding	- Feeds should be provided 2 times a day.



Manipur Centre, Lamphelpat, Imphal - 795 004





#### **MANIPUR BULLETIN**

22<sup>nd</sup> December, 2017

#### **Thoubal**

GKMS at AMFU- Lamphelpat, ICAR-RC Manipur Centre in association with India Meteorological Department, Regional Meteorological Centre, Guwahati and India Meteorological Department, New Delhi, Ministry of Earth Science, Govt. of India reports the weather forecasts for the next five days, i.e., from 23<sup>rd</sup> to 27<sup>th</sup> December, 2017 as below:

Significant past weather for the preceding bi-weekly of
Imphal - West (19 <sup>th</sup> to 21 <sup>st</sup> December, 2017)

Observed clear to partly cloudy sky and foggy morning hours on  $19^{th}$  during past three days with  ${\bf no}$  rainfall. Maximum temperature range of 21.7 to 23.2  $^{\circ}$  C and minimum temperature range of 8.8 to 10.0  $^{\circ}$  C with mean relative humidity 90 % max and 56.7 % min was recorded in the past three days.

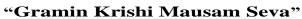
# Weather forecast for next five days of Thoubal (23<sup>rd</sup> to 27<sup>th</sup> December, 2017)

litres of water. Also apply Dithane M 45 @ 2g/ litre of water.

Likely to have no rains upto Wednesday. Morning hours are likely to have moderate to dense fog and sky may remain mainly clear during afternoon hours. The maximum temp. 23 - 24  $^{\rm o}$  C & minimum temp. 9 - 10  $^{\rm o}$  C and relative humidity may reach up to 85 % (max RH) & 49 % (min RH). The average wind speed may be 0 - 4 km/hr.

Field Crops		T	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Rapeseed/ Mustard/	Vegetative		- Apply 75 litres @10g urea / 15 litres as foliar application after 30 days of sowing.
		Aphid	<ul> <li>- Use yellow plates for every 3 sq.m to attract the aphids or spray Pyrethrum @ 2ml/ litre of water on the infected patches.</li> <li>- Spray Cypermethrin @ 2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.</li> </ul>
		Hairy caterpillar	- Spray Chloropyriphos @ 2ml/litre of water on the infected patches only.
Lentil/ Blackgram (late variety)/	Vegetative	Aphid	- Spray Cypermethrin @2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.
Field Pea		Powdery mildew & Yellow rust	- Spray Bayleton @ 7 g/ 10 litres of water against powdery mildew and yellow rust especially to the crops grown in moist/ shady area.
Rabi Maize	Land preparation to sowing		<ul> <li>Land preparation for sowing rabi maize may be done.</li> <li>Rabi maize may be sown as intercrop with potato or pulses. 60cm width 40cm high ridges along east-west may be prepared after ploughing. Southern face may be sown with maize and northern with pea seeds.</li> </ul>
Seeds storage	Post harvest management		For seed purpose dry, clean and store the seeds in <i>RC-seed bins</i> after proper drying of seeds along with charcoal at 80:20. Check for moisture content or weight of charcoal and dry if required.  For grains, store grains in well ventilated godowns after drying proper. Spray Malathion 1% on the walls of stores.
Horticulture Crops			
* Regular monitoring	g may be done for in	sect pest infestation.	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Cabbage/ Cauliflower/	Vegetative	Aphid	- If Infestation of aphid is less, drench the plant with strong sprays of water to remove aphid/ or remove infected plant part. But if the infestation is severe, spray evenly insecticidal soap or neem oil.
Tomato/ Potato		leaf eating caterpillar	- Spray Flubendiamide (Fame) @ 2ml/ 10 lit of water.
Cucurbits	Seed collection		- Procure good quality seeds from reliable source that is suitable to the location. Preparation for raising nurseries of cucurbits like water-melon, cucumber, sponge gourd, pumpkin, etc. in poly-pouch and trays may be done under polyhouse.
Tomato	Vegetative	Early blight	- Apply Dichlorovos @ 0.5ml/ litre of water or Imidachlorpid @ 2ml/ 5







Onion	Vegetative		- Apply 64kg Urea, 44kg DAP and 34 kg MOP per sangam as basal dose followed by 64kg urea/ sangam after 30-35 days after transplanting.
Cole crops	Nursery rais	sing	- Nursery for late crops may be raised.
Coriander/ Onion/ Garlic	Vegetative		- Avoid water logging in and around the crop field.
Animal Science		<del></del>	
Name of	Stage	Disease and	Agro-meteorological advisories
bird/ animal	A 11	Management	
Poultry (Chicken//	All age groups	Management	Protect animals/ birds from sudden drop in temperature. Cover the well with bassian electr/polythone sheet during night time.
Duck)			<ul><li>wall with hessian cloth/ polythene sheet during night time.</li><li>Litter must be stirred frequently and aired every day.</li></ul>
Sheep/ Goat	All age groups	Vaccination	• If the animals have not been vaccinated against F.M.D., B.Q., H.S.,
Sheep/ Goat	An age groups	Vaccination	Enterotoxaemia, etc. this must be done during this month.
			Take adequate care to prevent occurrence of Mastitis.
			<ul> <li>PPR immunization must be done once in every three years.</li> </ul>
		• De-worming	• Administer Tolzan-F @ 2.5ml orally/ 50kg b. wt.
		• Shearing for wool	Sheep should be sheared during this month.
Pig	All age groups	Coccidial infection	• Ofloxacine/ Ornidazole (O <sub>2</sub> ) tab twice daily for 5 days.
8	except the young	• De-worming	De-worm with Albendazole @7.5 mg/kg b.wt.
	ones	Vaccination	Vaccinate against FMD.
		• Skin disease	Sprayer of Anti- <i>Psoroptic</i> may be used
	All age groups	Vaccination	Vaccinate against B.Q., F.M.D. & H.S. if not yet vaccinated.
Cattle	excepts the	Vaccination	Cases of H.S. may be encountered during this period
Cattle	young ones		Immediate treatment using appropriate drugs with the help of
	Je mag asses		Consultant must be advocated to safe the animals.
		Deworming	De-worm with Albomac suspension@60-90ml for 300kg body weight
		20 Worming	or 20-30ml for 100 kg body weight.
		• Care & Management	Mixture of mineral/ salts should be added in the feed.
			• Avoid the cattle from chiting/biting by Flies
			Adopt tick control measures
		Mastitis	• Adequate care must be ensured for prevention of mastitis for the milch animals.
• Fodder cultiv	vation: Oat crop may	be sown immediately.	
Fishery:	•	<u>*</u>	
Type of Farming	Stage	Management	Agro-metrological advisories
			- Lime/ Aqua magic should be applied regularly to keep good quality pond water. Water depth should be maintained at 1.0-1.5m.
		Pond water	- Replace half of pond water with fresh & clean water at every 25-30
Carp culture	Grow-out		days interval.
- F Sarrar			- Minimum feed must be provided, i.e., @ 1-2% of body weight per day.
		Harvest	- As per market demand harvesting may be started.
		Feeding	- Feeds should be provided 2 times a day.



Manipur Centre, Lamphelpat, Imphal - 795 004





#### MANIPUR BULLETIN

22<sup>nd</sup> December, 2017

### <u>Ukhrul</u>

GKMS at AMFU- Lamphelpat, ICAR-RC Manipur Centre in association with India Meteorological Department, Regional Meteorological Centre, Guwahati and India Meteorological Department, New Delhi, Ministry of Earth Science, Govt. of India reports the weather forecasts for the next five days, i.e., from 23<sup>rd</sup> to 27<sup>th</sup> December, 2017 as below:

# Significant past weather for the preceding bi-weekly of Imphal - West (19<sup>th</sup> to 21<sup>st</sup> December, 2017)

Observed clear to partly cloudy sky and foggy morning hours on  $19^{th}$  during past three days with  ${\bf no}$  rainfall. Maximum temperature range of 21.7 to 23.2  $^{\circ}$  C and minimum temperature range of 8.8 to 10.0  $^{\circ}$  C with mean relative humidity 90 % max and 56.7 % min was recorded in the past three days.

# Weather forecast for next five days of Ukhrul (23<sup>rd</sup> to 27<sup>th</sup> December, 2017)

Likely to have no rains upto Wednesday. Morning hours are likely to have moderate to dense fog and sky may remain mainly clear during afternoon hours. The maximum temp. 19 - 20  $^{\circ}$  C & minimum temp. 6 - 7  $^{\circ}$  C and relative humidity may reach up to 84 % (max RH) & 46 % (min RH). The average wind speed may be 3 - 4 km/hr.

Field Crops			
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
	Vegetative		- Apply 75 litres @10g urea / 15 litres as foliar application after 30 days of sowing.
Rapeseed/ Mustard/		Aphid	<ul> <li>- Use yellow plates for every 3 sq.m to attract the aphids or spray Pyrethrum @ 2ml/ litre of water on the infected patches.</li> <li>- Spray Cypermethrin @ 2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.</li> </ul>
		Hairy caterpillar	- Spray Chloropyriphos @ 2ml/litre of water on the infected patches only.
Lentil/ Blackgram (late variety)/	Vegetative	Aphid	- Spray Cypermethrin @2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.
Field Pea		Powdery mildew & Yellow rust	- Spray Bayleton @ 7 g/ 10 litres of water against powdery mildew and yellow rust especially to the crops grown in moist/ shady area.
Rabi Maize	Land preparation to sowing		- Land preparation for sowing rabi maize may be done Rabi maize may be sown as intercrop with potato or pulses. 60cm width 40cm high ridges along east-west may be prepared after ploughing. Southern face may be sown with maize and northern with pea seeds.
Seeds storage	Post harvest management		For seed purpose dry, clean and store the seeds in <i>RC-seed bins</i> after proper drying of seeds along with charcoal at 80:20. Check for moisture content or weight of charcoal and dry if required.  For grains, store grains in well ventilated godowns after drying proper. Spray Malathion 1% on the walls of stores.
Horticulture Crops	<u> </u>	<u> </u>	wp-ny
* Regular monitoring	may be done for ir	sect pest infestation.	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Cabbage/ Cauliflower/ Tomato/ Potato	Vegetative	Aphid	- If Infestation of aphid is less, drench the plant with strong sprays of water to remove aphid/ or remove infected plant part. But if the infestation is severe, spray evenly insecticidal soap or neem oil.
		leaf eating caterpillar	- Spray Flubendiamide (Fame) @ 2ml/ 10 lit of water.
Onion	Vegetative		- Apply 64kg Urea, 44kg DAP and 34 kg MOP per sangam as basal dose followed by 64kg urea/ sangam after 30-35 days after transplanting.
Cole crops	Nursery raising		- Nursery for late crops may be raised.
Coriander/ Onion/ Garlic	Vegetative		- Avoid water logging in and around the crop field.



Manipur Centre, Lamphelpat, Imphal - 795 004





Animal Science	es		
Name of	Stage	Disease and	Agro-meteorological advisories
bird/ animal		Management	
Poultry	All age groups	<ul> <li>Management</li> </ul>	• Protect animals/ birds from sudden drop in temperature. Cover the
(Chicken//			wall with hessian cloth/ polythene sheet during night time.
Duck)			Litter must be stirred frequently and aired every day.
Sheep/ Goat	All age groups	<ul> <li>Vaccination</li> </ul>	• If the animals have not been vaccinated against F.M.D., B.Q., H.S.,
			Enterotoxaemia, etc. this must be done during this month.
			• Take adequate care to prevent occurrence of Mastitis.
			PPR immunization must be done once in every three years.
		De-worming	• Administer Tolzan-F @ 2.5ml orally/ 50kg b. wt.
		Shearing for wool	• Sheep should be sheared during this month.
Pig	All age groups	<ul> <li>Coccidial infection</li> </ul>	• Ofloxacine/ Ornidazole (O <sub>2</sub> ) tab twice daily for 5 days.
	except the young	• De-worming	• De-worm with Albendazole @7.5 mg/kg b.wt.
	ones	Vaccination	Vaccinate against FMD.
		Skin disease	• Sprayer of Anti- <i>Psoroptic</i> may be used
	All age groups	Vaccination	Vaccinate against B.Q., F.M.D. & H.S. if not yet vaccinated.
Cattle	excepts the young ones		• Cases of H.S. may be encountered during this period
			• Immediate treatment using appropriate drugs with the help of
			Consultant must be advocated to safe the animals.
		Deworming	• De-worm with Albomac suspension@60-90ml for 300kg body weight or 20-30ml for 100 kg body weight.
		Care & Management	Mixture of mineral/ salts should be added in the feed.
			<ul> <li>Avoid the cattle from chiting/biting by Flies</li> </ul>
			Adopt tick control measures
		Mastitis	• Adequate care must be ensured for prevention of mastitis for the milch
			animals.
	ation: Oat crop may	be sown immediately.	
Fishery:			
Type of	Stage	Management	Agro-metrological advisories
Farming			
Commonltone			- Lime/ Aqua magic should be applied regularly to keep good quality
	Grow-out	Pond water	pond water. Water depth should be maintained at 1.0-1.5m Replace half of pond water with fresh & clean water at every 25-30
		rond water	days interval.
Carp culture			- Minimum feed must be provided, i.e., @ 1-2% of body weight per day.
		Harvest	- As per market demand harvesting may be started.
		Feeding	- Feeds should be provided 2 times a day.
		reeding	- reeds should be provided 2 times a day.

(I. Meghachandra Singh) Scientist i/c, GKMS



Manipur Centre, Lamphelpat, Imphal - 795 004

#### "Gramin Krishi Mausam Seva"



#### MANIPUR BULLETIN

22<sup>nd</sup> December, 2017

#### Imphal East

GKMS at AMFU- Lamphelpat, ICAR-RC Manipur Centre in association with India Meteorological Department, Regional Meteorological Centre, Guwahati and India Meteorological Department, New Delhi, Ministry of Earth Science, Govt. of India reports the weather forecasts for the next five days, i.e., from 23<sup>rd</sup> to 27<sup>th</sup> December, 2017 as below:

Significant past weather for the preceding bi-weekly of					
Imphal - West (19 <sup>th</sup> to 21 <sup>st</sup> December, 2017)					
Observed along to partly aloudy sky and forcy marring					

Observed clear to partly cloudy sky and foggy morning hours on  $19^{\text{th}}$  during past three days with **no** rainfall. Maximum temperature range of 21.7 to 23.2  $^{\circ}$  C and minimum temperature range of 8.8 to 10.0  $^{\circ}$  C with mean relative humidity 90 % max and 56.7 % min was recorded in the past three days.

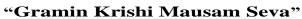
## Weather forecast for next five days of Imphal East (23<sup>rd</sup> to 27<sup>th</sup> December, 2017)

litres of water. Also apply Dithane M 45 @ 2g/ litre of water.

Likely to have no rains upto Wednesday. Morning hours are likely to have moderate to dense fog and sky may remain mainly clear during afternoon hours. The maximum temp. 22 - 23  $^{\rm o}$  C & minimum temp. 8 - 9  $^{\rm o}$  C and relative humidity may reach up to 91 % (max RH) & 46 % (min RH). The average wind speed may be 3 - 4 km/hr.

Field Crops		T	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Rapeseed/ Mustard/	Vegetative		- Apply 75 litres @10g urea / 15 litres as foliar application after 30 days of sowing.
		Aphid	<ul> <li>- Use yellow plates for every 3 sq.m to attract the aphids or spray Pyrethrum @ 2ml/ litre of water on the infected patches.</li> <li>- Spray Cypermethrin @ 2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.</li> </ul>
		Hairy caterpillar	- Spray Chloropyriphos @ 2ml/litre of water on the infected patches only.
Lentil/ Blackgram (late variety)/	Vegetative	Aphid	- Spray Cypermethrin @2ml/lit of water or Nuvan @ 0.5ml/ lit of water against aphid. For organic control against aphid, sprays that consist of Azadirachtin, neem oil or Pyrethrin may be used.
Field Pea		Powdery mildew & Yellow rust	- Spray Bayleton @ 7 g/ 10 litres of water against powdery mildew and yellow rust especially to the crops grown in moist/ shady area.
Rabi Maize	Land preparation to sowing		<ul> <li>Land preparation for sowing rabi maize may be done.</li> <li>Rabi maize may be sown as intercrop with potato or pulses. 60cm width 40cm high ridges along east-west may be prepared after ploughing. Southern face may be sown with maize and northern with pea seeds.</li> </ul>
Seeds storage	Post harvest management		For seed purpose dry, clean and store the seeds in <i>RC-seed bins</i> after proper drying of seeds along with charcoal at 80:20. Check for moisture content or weight of charcoal and dry if required.  For grains, store grains in well ventilated godowns after drying proper. Spray Malathion 1% on the walls of stores.
Horticulture Crops			
* Regular monitoring	g may be done for in	sect pest infestation.	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
Cabbage/ Cauliflower/	Vegetative	Aphid	- If Infestation of aphid is less, drench the plant with strong sprays of water to remove aphid/ or remove infected plant part. But if the infestation is severe, spray evenly insecticidal soap or neem oil.
Tomato/ Potato		leaf eating caterpillar	- Spray Flubendiamide (Fame) @ 2ml/ 10 lit of water.
Cucurbits	Seed collection		- Procure good quality seeds from reliable source that is suitable to the location. Preparation for raising nurseries of cucurbits like water-melon, cucumber, sponge gourd, pumpkin, etc. in poly-pouch and trays may be done under polyhouse.
Tomato	Vegetative	Early blight	- Apply Dichlorovos @ 0.5ml/ litre of water or Imidachlorpid @ 2ml/ 5







Onion	Vegetative		- Apply 64kg Urea, 44kg DAP and 34 kg MOP per sangam as basal dose followed by 64kg urea/ sangam after 30-35 days after transplanting.
Cole crops	Nursery rais	sing	- Nursery for late crops may be raised.
Coriander/ Onion/ Garlic	Vegetative		- Avoid water logging in and around the crop field.
Animal Science		<del></del>	
Name of	Stage	Disease and	Agro-meteorological advisories
bird/ animal	A 11	Management	
Poultry (Chicken//	All age groups	Management	Protect animals/ birds from sudden drop in temperature. Cover the well with bassian electr/polythone sheet during night time.
Duck)			<ul><li>wall with hessian cloth/ polythene sheet during night time.</li><li>Litter must be stirred frequently and aired every day.</li></ul>
Sheep/ Goat	All age groups	Vaccination	• If the animals have not been vaccinated against F.M.D., B.Q., H.S.,
Sheep/ Goat	An age groups	Vaccination	Enterotoxaemia, etc. this must be done during this month.
			Take adequate care to prevent occurrence of Mastitis.
			<ul> <li>PPR immunization must be done once in every three years.</li> </ul>
		• De-worming	• Administer Tolzan-F @ 2.5ml orally/ 50kg b. wt.
		• Shearing for wool	Sheep should be sheared during this month.
Pig	All age groups	Coccidial infection	• Ofloxacine/ Ornidazole (O <sub>2</sub> ) tab twice daily for 5 days.
8	except the young	• De-worming	De-worm with Albendazole @7.5 mg/kg b.wt.
	ones	Vaccination	Vaccinate against FMD.
		• Skin disease	Sprayer of Anti- <i>Psoroptic</i> may be used
	All age groups	Vaccination	Vaccinate against B.Q., F.M.D. & H.S. if not yet vaccinated.
Cattle	excepts the	Vaccination	Cases of H.S. may be encountered during this period
Cattle	young ones		Immediate treatment using appropriate drugs with the help of
	Je mag asses		Consultant must be advocated to safe the animals.
		Deworming	De-worm with Albomac suspension@60-90ml for 300kg body weight
		20 Worming	or 20-30ml for 100 kg body weight.
		• Care & Management	Mixture of mineral/ salts should be added in the feed.
			• Avoid the cattle from chiting/biting by Flies
			Adopt tick control measures
		Mastitis	• Adequate care must be ensured for prevention of mastitis for the milch animals.
• Fodder cultiv	vation: Oat crop may	be sown immediately.	
Fishery:	•	<u>*</u>	
Type of Farming	Stage	Management	Agro-metrological advisories
			- Lime/ Aqua magic should be applied regularly to keep good quality pond water. Water depth should be maintained at 1.0-1.5m.
		Pond water	- Replace half of pond water with fresh & clean water at every 25-30
Carp culture	Grow-out		days interval.
- F Sarrar			- Minimum feed must be provided, i.e., @ 1-2% of body weight per day.
		Harvest	- As per market demand harvesting may be started.
		Feeding	- Feeds should be provided 2 times a day.



Manipur Centre, Lamphelpat, Imphal - 795 004

#### "Gramin Krishi Mausam Seva"



#### **MANIPUR BULLETIN**

22<sup>nd</sup> December, 2017

### **Imphal West**

GKMS at AMFU- Lamphelpat, ICAR-RC Manipur Centre in association with India Meteorological Department, Regional Meteorological Centre, Guwahati and India Meteorological Department, New Delhi, Ministry of Earth Science, Govt. of India reports the weather forecasts for the next five days, i.e., from 23<sup>rd</sup> to 27<sup>th</sup> December, 2017 as below:

Significant past weather for the preceding bi-weekly of Imphal - West (19<sup>th</sup> to 21<sup>st</sup> December, 2017)

Observed clear to partly cloudy sky and foggy morning hours on  $19^{th}$  during past three days with  ${\bf no}$  rainfall. Maximum temperature range of 21.7 to 23.2  $^{\circ}$  C and minimum temperature range of 8.8 to 10.0  $^{\circ}$  C with mean relative humidity 90 % max and 56.7 % min was recorded in the past three days.

Weather forecast for next five days of Imphal East (23<sup>rd</sup> to 27<sup>th</sup> December, 2017)

litres of water. Also apply Dithane M 45 @ 2g/ litre of water.

Likely to have no rains upto Wednesday. Morning hours are likely to have moderate to dense fog and sky may remain mainly clear during afternoon hours. The maximum temp. 22 - 23  $^{\rm o}$  C & minimum temp. 8 - 9  $^{\rm o}$  C and relative humidity may reach up to 91 % (max RH) & 46 % (min RH). The average wind speed may be 3 - 4 km/hr.

Field Crops	T	T	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
			- Apply 75 litres @10g urea / 15 litres as foliar application after 30 days
			of sowing.
		Aphid	- Use yellow plates for every 3 sq.m to attract the aphids or spray
Rapeseed/			Pyrethrum @ 2ml/ litre of water on the infected patches.
Mustard/	Vegetative		- Spray Cypermethrin @ 2ml/lit of water or Nuvan @ 0.5ml/ lit of water
Mustaru/			against aphid. For organic control against aphid, sprays that consist of
			Azadirachtin, neem oil or Pyrethrin may be used.
		Hairy caterpillar	- Spray Chloropyriphos @ 2ml/litre of water on the infected patches
			only.
		Aphid	- Spray Cypermethrin @2ml/lit of water or Nuvan @ 0.5ml/ lit of water
Lentil/ Blackgram			against aphid. For organic control against aphid, sprays that consist of
(late variety)/	Vegetative		Azadirachtin, neem oil or Pyrethrin may be used.
Field Pea		Powdery mildew	- Spray Bayleton @ 7 g/ 10 litres of water against powdery mildew and
		& Yellow rust	yellow rust especially to the crops grown in moist/ shady area.
			- Land preparation for sowing rabi maize may be done.
	Land		- Rabi maize may be sown as intercrop with potato or pulses. 60cm
Rabi Maize	preparation to		width 40cm high ridges along east-west may be prepared after
	sowing		ploughing. Southern face may be sown with maize and northern with pea
			seeds.
			For seed purpose dry, clean and store the seeds in RC-seed bins after
	Post harvest		proper drying of seeds along with charcoal at 80:20. Check for moisture
Seeds storage	management		content or weight of charcoal and dry if required.
			For grains, store grains in well ventilated godowns after drying proper.
			Spray Malathion 1% on the walls of stores.
Horticulture Crops			
* Regular monitoring	g may be done for in	1	
Name of the crop	Stage	Pest and disease	Agro-meteorological advisories
		Aphid	- If Infestation of aphid is less, drench the plant with strong sprays of
Cabbage/			water to remove aphid/ or remove infected plant part. But if the
Cauliflower/	Vegetative		infestation is severe, spray evenly insecticidal soap or neem oil.
Tomato/ Potato		leaf eating	- Spray Flubendiamide (Fame) @ 2ml/ 10 lit of water.
		caterpillar	
Cucurbits	Seed collection		- Procure good quality seeds from reliable source that is suitable to the
			location. Preparation for raising nurseries of cucurbits like water-melon
			cucumber, sponge gourd, pumpkin, etc. in poly-pouch and trays may be
			done under polyhouse.
Tomato	Vegetative	Early blight	- Apply Dichlorovos @ 0.5ml/ litre of water or Imidachlorpid @ 2ml/ 5
		,	L'arrest Alexand D'il arrest A A S & 2 / l'arrest A







Onion	Vegetative			- Apply 64kg Urea, 44kg DAP and 34 kg MOP per sangam as basal dose followed by 64kg urea/ sangam after 30-35 days after transplanting.
Cole crops	Nursery rais:		ng	- Nursery for late crops may be raised.
Coriander/ Onion/ Garlic	<b>Farlic</b> Vegetative			- Avoid water logging in and around the crop field.
<b>Animal Science</b>	1			
Name of bird/ animal		Stage	Disease and Management	Agro-meteorological advisories
Poultry (Chicken// Duck)	All age groups		• Management	<ul> <li>Protect animals/ birds from sudden drop in temperature. Cover the wall with hessian cloth/ polythene sheet during night time.</li> <li>Litter must be stirred frequently and aired every day.</li> </ul>
Sheep/ Goat	*		Vaccination	<ul> <li>If the animals have not been vaccinated against F.M.D., B.Q., H.S., Enterotoxaemia, etc. this must be done during this month.</li> <li>Take adequate care to prevent occurrence of Mastitis.</li> <li>PPR immunization must be done once in every three years.</li> </ul>
			<ul> <li>De-worming</li> </ul>	• Administer Tolzan-F @ 2.5ml orally/ 50kg b. wt.
			<ul> <li>Shearing for wool</li> </ul>	• Sheep should be sheared during this month.
Pig	All age	e groups	<ul> <li>Coccidial infection</li> </ul>	• Ofloxacine/ Ornidazole (O <sub>2</sub> ) tab twice daily for 5 days.
	except the young		De-worming	• De-worm with Albendazole @7.5 mg/kg b.wt.
	ones		Vaccination	Vaccinate against FMD.
			Skin disease	• Sprayer of Anti- <i>Psoroptic</i> may be used
Cattle All age groups excepts the young ones		Vaccination	<ul> <li>Vaccinate against B.Q., F.M.D. &amp; H.S. if not yet vaccinated.</li> <li>Cases of H.S. may be encountered during this period</li> <li>Immediate treatment using appropriate drugs with the help of Consultant must be advocated to safe the animals.</li> </ul>	
			Deworming	• De-worm with Albomac suspension@60-90ml for 300kg body weight or 20-30ml for 100 kg body weight.
			Care & Management	<ul> <li>Mixture of mineral/ salts should be added in the feed.</li> <li>Avoid the cattle from chiting/biting by Flies</li> <li>Adopt tick control measures</li> </ul>
			Mastitis	Adequate care must be ensured for prevention of mastitis for the milch animals.
• Fodder cultiv	vation: C	at crop may	be sown immediately.	
Fishery:			•	
Type of Farming	Stage	2	Management	Agro-metrological advisories
Carp culture	Grow	-out	Pond water	<ul> <li>- Lime/ Aqua magic should be applied regularly to keep good quality pond water. Water depth should be maintained at 1.0-1.5m.</li> <li>- Replace half of pond water with fresh &amp; clean water at every 25-30 days interval.</li> <li>- Minimum feed must be provided, i.e., @ 1-2% of body weight per day.</li> </ul>
			Harvest Feeding	- As per market demand harvesting may be started Feeds should be provided 2 times a day.
			recuilig	- recus should be provided 2 times a day.