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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

**(Begusarai)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **10** | **10** | **10** | **Light to medium** |
| **Max. T (°C)** | **34** | **34** | **33** | **33** | **32** | **Maximum temperature will remain between 32-34°C and the minimum between** **26-27°C.** |
| **Mini. T (°C)** | **26** | **27** | **27** | **27** | **26** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **90** | **90** | **90** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **65** | **60** | **60** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Westerly** | **Westerly** | **Westerly** | **Easterly/Westerly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

**(A. Sattar)**

**(Nodal Office**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Darbhanga)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **15** | **20** | **20** | **Light to medium** |
| **Max. T (°C)** | **32** | **32** | **32** | **31** | **30** | **Maximum temperature will remain between 30-32°C and the minimum between** **26-27°C.** |
| **Mini. T (°C)** | **26** | **26** | **27** | **27** | **26** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(East Champaran)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **10** | **20** | **20** | **Light to medium** |
| **Max. T (°C)** | **35** | **35** | **34** | **33** | **32** | **Maximum temperature will remain between 32-35°C and the minimum between** **25-27°C.** |
| **Mini. T (°C)** | **26** | **27** | **26** | **26** | **25** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer)**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Gopalganj)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **10** | **20** | **20** | **Light to medium** |
| **Max. T (°C)** | **35** | **35** | **34** | **33** | **32** | **Maximum temperature will remain between 32-35°C and the minimum between** **25-27°C.** |
| **Mini. T (°C)** | **26** | **27** | **26** | **26** | **25** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer)**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Madhubani)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **15** | **20** | **20** | **Light to medium** |
| **Max. T (°C)** | **32** | **32** | **32** | **31** | **30** | **Maximum temperature will remain between 30-32°C and the minimum between** **26-27°C.** |
| **Mini. T (°C)** | **26** | **26** | **27** | **27** | **26** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
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 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer)**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Muzaffarpur)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **10** | **10** | **20** | **Light to medium** |
| **Max. T (°C)** | **31** | **32** | **32** | **33** | **32** | **Maximum temperature will remain between 31-33°C and the minimum between** **26-27°C.** |
| **Mini. T (°C)** | **26** | **27** | **27** | **27** | **26** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer)**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Samastipur)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **15** | **20** | **20** | **Light to medium** |
| **Max. T (°C)** | **32** | **32** | **32** | **31** | **30** | **Maximum temperature will remain between 30-32°C and the minimum between** **26-27°C.** |
| **Mini. T (°C)** | **26** | **26** | **27** | **27** | **26** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer)**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Saran)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **10** | **10** | **20** | **Light to medium** |
| **Max. T (°C)** | **32** | **32** | **33** | **33** | **32** | **Maximum temperature will remain between 32-33°C and the minimum between** **25-27°C.** |
| **Mini. T (°C)** | **26** | **26** | **27** | **27** | **25** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Shivhar)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **10** | **10** | **20** | **Light to medium** |
| **Max. T (°C)** | **31** | **32** | **32** | **33** | **32** | **Maximum temperature will remain between 31-32°C and the minimum between** **26-27°C.** |
| **Mini. T (°C)** | **26** | **26** | **27** | **27** | **26** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer)**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Sitamarhi)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **10** | **20** | **20** | **Light to medium** |
| **Max. T (°C)** | **31** | **32** | **32** | **31** | **31** | **Maximum temperature will remain between 31-32°C and the minimum between** **26-27°C.** |
| **Mini. T (°C)** | **26** | **26** | **27** | **27** | **26** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer)**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Siwan)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **10** | **20** | **20** | **Light to medium** |
| **Max. T (°C)** | **35** | **35** | **35** | **34** | **32** | **Maximum temperature will remain between 32-35°C and the minimum between** **25-27°C.** |
| **Mini. T (°C)** | **26** | **27** | **27** | **26** | **25** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
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 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer)**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

**Weather during the previous forecast period**

According to meteorological data recorded at Agro meteorological Observatory, Pusa (Bihar), average maximum and minimum temperature were 32.4°C and 25.1°C respectively. Average relative humidity was 91 percent at 0700 hrs. and 77 percent at 1400 hrs. Soil temperature at 5 cm depth was 27.5°C at 0700 hrs. and 31.9°C at 1400 hrs. Average wind speed, daily sunshine hours and average daily evaporation were 5.9 km/hr, 6.9 hours and 3.9 mm respectively. At the center, about 35.8 mm rainfall has been recorded.

**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(Vaishali)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **15** | **20** | **20** | **Light to medium** |
| **Max. T (°C)** | **32** | **32** | **32** | **31** | **30** | **Maximum temperature will remain between 30-32°C and the minimum between** **26-27°C.** |
| **Mini. T (°C)** | **26** | **27** | **27** | **26** | **26** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
* Monitoring of *khaira* disease is advised in late transplanted paddy. The disease is caused by zinc deficiency. If symptoms occur, spraying of zinc sulphate@5.0 kg mixed with lime@2.5 kg in 500 liters of water is advised for one hectare cropped area.
* Regular monitoring is advised for infestation of leaf folder in paddy crop. The larva of insect rolls the leaf blade by fastening its edges and sometimes even fastening the leaf tip to the basal part of the leaf blade and feeds by scraping inside the fold. The leaf becomes membranous and turns white. If infestation is observed, application of Cartap Hydrochloride 4G (*Caldan) @*10kg/acre is advised.
 |
| September Pigeon pea*(Arhar)* | Sowing | * In upland areas, sowing of *Pusa-9* and *Sarad* varieties of September pigeon pea is advised. The weather condition for its sowing is getting favorable. During land preparation, application of 20kg/ha Nitrogen, 45kg/ha Phosphorus, 20 kg/ha Potash and 20 kg sulphur/ha is advised. Seeds should be treated with Thiram/Capton @2.5gm/kg of seed.
* Regular monitoring is advised in July sown pigeon pea crop against insect pest and disease infestation.
 |
| Vegetables Nursery  | - | Monitoring of sucking insect pests such as white fly, leaf hopper and aphid is advised in vegetables nursery. These pests cause viral infections in the nursery crop. Spraying of Imidaclorprid @ 0.3ml/liter of water is suggested to protect the nursery crop.  |
| Cabbage | Nursery sowing | Nursery sowing of early varieties of cabbage is advised. *Pride of India, Golden Acre, Pusa mukta, Pusa agate, and early drum head* varieties of cabbage are recommended for sowing under North Bihar agro climatic condition.  |
| Radish  | Sowing | Sowing of early varieties of radish such as *Pusa chetki, Pusa desi, Jounpuri, Pusa himani, Japani safed, Pusa rashmi, Punjab safed and Arka nishant* are advised in North Bihar region. The planting distance should be maintained at 25X10 cm. Seed rate @4-5 kg/hectare is suggested. |
| Animal care | - | Prophylactic measures against contagious diseases for milch animals are advised as per instruction of veterinarians. Hygiene should be maintained at the place where animals are kept. |

 **(A. Sattar)**

**(Nodal Officer)**

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| **GRAMIN KRISHI MAUSAM SEWA (GKMS)****AGRO-METEOROLOGY DIVISION****Dr. Rajendra Prasad Central Agricultural University, Pusa** **Samastipur, Bihar -848 125** |
| **Bulletin No. 64****Date: Tuesday, 4 September, 2018** | **F:\15349550_1863725520538190_1704492238980604982_n.jpg** |  **Phone No : 06274-240266** |

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**Medium Range Weather Forecast**

**(5 -9th September, 2018)**

 **(West Champaran)**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Weather parameters** | **5th****September** | **6th****September** | **7th****September** | **8th****September** | **9th****September** | **Remarks** |
| **Rainfall(mm)** | **10** | **10** | **20** | **20** | **20** | **Light to medium** |
| **Max. T (°C)** | **35** | **35** | **34** | **33** | **32** | **Maximum temperature will remain between 32-35°C and the minimum between** **25-27°C.** |
| **Mini. T (°C)** | **26** | **27** | **26** | **26** | **25** |
| **Cloud cover (okta)** | **6** | **6** | **7** | **7** | **7** | **Mainly cloudy sky** |
| **Max Relative Humidity (%)** | **90** | **95** | **95** | **95** | **95** |  |
| **Min Relative Humidity (%)** | **70** | **70** | **75** | **75** | **75** |  |
| **Wind speed (kmph)** | **10** | **10** | **10** | **10** | **10** |  |
| **Wind direction(deg)** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** | **Easterly** |

**Advisory for the farmers**

|  |  |  |
| --- | --- | --- |
| **Crop** | **Phenophases**  | **Advisory (Based on weather forecast)** |
| Paddy | Vegetative | * Regular monitoring of brown plant hopper (BPH) in paddy crop is advised. This mosquito type insect-pest may be seen at the basal portion of the plant in the middle of the crop field. The adults and nymphs suck the sap; resulting in reddening of leaves in the beginning and subsequently drying of leaves. In case of heavy infestation, the rice leaves turn brown and plants fail to produce ears. Reduction in the tillering of plants is also seen in the field. To protect the crop, spraying of Imidacloprid 17.8 % SC @ 1.0 ml / 3 liter of water is advised in clear day condition.
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 **(A. Sattar)**

**(Nodal Officer)**