

Gramin Krishi Mausam Sewa District Level Agromet Advisory Bulletin

Central Institute for Cotton Research, Nagpur



Agromet Advisory Bulletin

Date: 09-06-2023

Weather Forecast of District NAGPUR(Maharashtra) Issued On: 2023-06-09(Valid Till 08:30 IST of the next 5 days)

Parameter	2023-06-10	2023-06-11	2023-06-12	2023-06-13	2023-06-14
Rainfall(mm)	4	2	2	5	12
Tmax(°C)	43.5	43.1	42.6	41.2	40.3
Tmin(°C)	24.4	24.4	22.1	23.4	22.1
RH-I(%)	32	32	43	41	44
RH-II(%)	19	18	21	29	27
Wind Speed(kmph)	14	15	17	15	14
Wind Direction(Degree)	252	292	279	288	290
Cloud Cover(Octa)	5	4	4	3	5

Weather Summary/Alert:

• In Nagpur district, as per the district level value added forecast given by, IMD, RMC, Nagpur, sky will be partly cloudy during next five days i.e. 10thto 14th, June, 2023. • Very light to light rainfall very likely to occur at isolated places on 10th, 11th, 13th and 14th, June, 2023. • Thunderstorm with lightning accompanied with gusty winds (30-40 kmph) likely to occur at isolated pockets on 10th and 11th, June, 2023. • Thunderstorm with lightning accompanied likely to occur at isolated pockets on 13th and 14th, June, 2023. • Maximum temperature will be 40.2 to 42.2 degree Celsius and minimum temperature will 27.1 to 27.7 degree Celsius during next five days. • No large charge in maximum temperature over Vidarbha during next 5 day. • No large charge in minimum temperature over Vidarbha during next 4-5 day.

General Advisory:

• Avoid letting cow, buffalo, goats, sheep, and other cattle's/animals graze in open spaces as there is a possibility of rain, gusty wind and lightning. Animals should be kept away from open water sources, rivers or lakes and tractors and metal. • Considering windsspeed, it is advised to support the fruit orchards and vegetables with bamboo stick. • Land preparation should be done (ploughing, harrowing) across the main slop/parallel to counter line to avoid the soil erosion and in situ moisture conservation. • It is advised to avoid pre-monsoon cotton planting. • Considering the prevailing temperature, green shade net should be used to protect summer vegetable crop from heat. • Mulching of newly planted fruit trees of 1 to 4 years of age should be done with farm waste (palapachola) or wheat straw etc. Cover small plants with Cotton or Arhar stalk. • Taking into consideration the increasing temperature forecast, priority should be given to carry out the most important work in agriculture before 11 am. • Soil samples should be taken for soil testing and sent to authorised or government soil testing laboratory with appropriate charges. • Farmers should make available the recommended seeds and fungicides and bio fertilizers required for seed treatment.

SMS Advisory:

• Farmers and agricultural laborers should download and use Damini (Lightning Alert) mobile app from Google Play Store and App Store to get early warning of lightning hazard.

Crop Specific Advisory:

Crop(Varieties)	Crop Specific Advisory
COTTON	• Sowing of cotton crop should be done in the month of June, only after receipt of 75-100 mm of monsoon rainfall. • Crop rotation to be followed in the fields that were heavily infested with pink bollworm during last season to break the life cycle of pink bollworm. • Cotton is the only host of pink bollworm, therefore crop rotation helps to break the life cycle of this pest. • Crop rotation is very effective in checking the infection of soil borne diseases and nematodes in disease prone fields. • Use short to medium duration Bt /non Bt varieties for rainfed sowing and mid-late to late varieties for irrigated condition. • Farmers are advised to practice seed treatment for management of seed borne diseases with Carboxin 37.5% + Thiram 37.5% DS) @ 3.5 g per kg of seeds (root rot and bacterial diseases) or Fluxapyroxad (333 g/L FS) @1.5 ml per kg seed or Tetraconazole 11.6% W/W (12.5% w/v) SL @1.5 ml per kg of seeds for seed borne diseases (for root rot disease). • Also, give seed treatment of Azotobacter for nitrogen fixation and PSB @20 -25 g/kg seed for phosphate solubilization. • Include intercrops like Green gram and Black gram in cotton in 1:1 row proportion. • Use Pendimethalin 38.7 % CS @ 700 ml per acre in 200 litres of water as pre -emergence weedicide to control weeds in early stage of crop. • Follow recommended spacing and fertilizer doses for arboreum (60x15, 60x30cm, 40:20:20 Kg NPK/ha), Improved hirsutum Cotton (60x30cm, 60:30:30 Kg NPK/ha) and Rainfed Bt hybrid cotton (90x45, 90x60, 90:45:45 Kg NPK/ha) and irrigated Bt Cotton (120x30, 120x60 cm, 120:60:60 Kg NPK/ha, respectively.
SOYABEAN	• The soybean farmers are requested to use Broad Bed Furrow (BBF) or Ridge & Furrow. This will facilitate managing the crop both in case of waterlogging as well as drought situation. • In order to have stability in yield, farmers are advised to apply deep summer ploughing once in 2-3 years. After this, the field should be prepared using criss-cross harrowing followed by planking. • If deep summer ploughing is performed during last 2-3 years, the field may be prepared using criss-cross harrowing followed by planking • Apply well decomposed FYM @ 10 t/ha or Poultry Manure @ 2.5 t/ha before the last harrowing. • As per suitability, farmers are advised to run sub-soiler machine at an interval of 10 m which facilitate the breaking of hard soil pan thereby increasing the rain water infiltration. • Select the soybean varieties recommended for your area and ensure the availability of seed. • Carryout germination test of the available seed which should be minimum 70% in order to have optimum plant population. • Ensure availability of other critical inputs like fertilizers, weedicides, fungicides and cultures for seed treatment etc.
GROUNDNUT	• For kharif groundnut cultivation, medium, well drained, humus rich, sand mixed clay soil and organic matter rich soil should be select. For groundnut cultivation, soil layer of 15 to 20 cm should be humorous. Apply 5 tons of well decomposed manure before the last harrowing.
PIGEON PEA (RED GRAM/ARHAR)	• Agricultural land should be prepared for cultivation of Arhar crop. Good quality seeds of Arhar crop should be procured from authorized seller/certified seed holder only. Rhizobium or Phosphorus Dissolving Fertilizer (PSB) {250 gm per 10 kg of seed) should be used for seedtreatment. Recommended varieties of Arhar are- AKT-8811, PKV-TARA, BSMR-853, BSMR-736 and ICPL-87119 (Aasha).
GREEN GRAM	• PKV Moog-8802, PKV Green gold (AKM 9911) varieties of green gram should be select for cultivation of green gram crop,
BLACK GRAM	• For cultivation of Black gram crop, TAU-1, TAU-2, PKV udid-15 and PKV black gold varieties should be select,

Horticulture Specific Advisory:

Horticulture(Varieties)	Horticulture Specific Advisory
MANDARIN ORANGE	• For establishment of new orchard suitability of the soil needs to be examined. The soil depth should be a minimum of 1 meter but equally high-performance orchards can be established on soil depth measuring even less than 1 meter provided precision based cultural practices including the fertilization programme are adopted. The soil site should preferably be well drained, clay less than 60%, pH less than 8.3, free calcium carbonate less than 12 % and water table of the area more than 2 meters should be selected. • The pits excavated during the month of May may be filled up by a mixture containing 2 parts soil, one-part sand and 1 parts farmyard manure. In addition, add 1 kg Single super phosphate, 1 kg of neem cake and 100 g Chlorpyrifos powder in each pit. • Nurseryman of citrus should start filling polythene bags with the mixture of garden soil, FYM and sand. Proper perforation for water should be done on the bags adequately. • Drainage channels (trenching size: 30cm depth, 45 cm top width and 30 cm bottom width) after each 2 rows of

Horticulture(Varieties)	Horticulture Specific Advisory
	plants along the slope should be prepared to remove excess water from the orchard in rainy season.
MANDARIN ORANGE	• For effective management of gummosis of Nagpur mandarin gummosis-affected portion from where gum is oozing needs to be scraped out with sharp knife, taking care not to damage the wood. Cleaned portion pasting with Metalaxyl MZ* (50 g/l) or Fosetyl-Al* (50 g/l) at initiation of disease and second after 30 days from initiation of the disease. • For controlling citrus mealy bugs, the basin around the tree trunk should be earthed up. Wrap sticky band by smearing with mobile oil around the tree trunk and destruction of ant's nests should be done and spraying of Chlorpyrifos 20 EC @ 5ml/liters of water and apply in ant nests. For control of mealy bug Chlorpyrifos 20 EC @ 2ml/liters of water or dimethoate 2ml/litre of water should be done on the tree leaves and trunk.
MANDARIN ORANGE	• In case a new orchard of citrus is to be established then dig the pits of size (75cm x 75cm x 75cm) at 6 x 6 meter spacing for Nagpur Santra (Nagpur mandarin), Mosambi (Sweet orange) and acid lime and the pits should be kept exposed to solar rays.
MANDARIN ORANGE	• Mulching helps in maintaining soil moisture for long period. 2 per cent Kaolin spray to reduce the transpiration. Application of copper oxychloride 50 WP @ 25 gram per 10 litres of water for controlling fruit let blight infection.
ACID LIME	• In acid lime 1 to 4 year tree should be given 11 to 35 litres water per day per tree, 5 to 7 year tree be given 42 to 61 litres water per day per tree, 8 to 10 years tree be given 73 to 108 litres water per day per tree. • In acid lime orchards, citrus canker heavily occurs due to rain and hailstorm. Pruning and destruction of infected twigs should be done. Foliar spray of 180 gram of copper oxychloride and 6 gram of Streptocycline in 60 litre of water may be applied.
CABBAGE	• Considering the previous week cloudy weather, for management of aphids on Cabbage & Cauliflower, spray Dimethoate 30 EC 13 ml or Cyantraniliprole 10.26 OD 12 ml per 10 liters of water. • Considering the previous week cloudy weather, for management of Diamond Back Moth on Cabbage & Cauliflower, Spraying should be done of Chlorpyrifos 20 EC 40 ml or Spinosad 2.5 SC 12 ml or Fenvalerate 20 EC 5 ml per 10 liters of water. • Spraying operation should be done during the clear and calm weather.
CHILLI	• Considering the increased temperature and cloudy weatherin the chilli crop, for avoiding flower drop in chilli, apply Planofix 5 ml/9 litre of water, 50 to 70 days after planting. • Due to present weather condition for control of sap sucking pest on Chilli crops, spray 5 % Neem ark or Imidacloprid 17.8 SL 5 ml per 10 lit. of water. • In chilli, if thrips, fruit borer and tobacco leaf eating caterpillar crosses ETL spraying should be done of Cyantraniliprole 10.26 OD at the rate of 12.0 ml per 10 litres of water during clear weather condition.
ТОМАТО	• If the symptoms of Late Blight of tomato was noticed due to the previous cloudy weather, spraying should be done with Mancozeb (2.0 g/l) or Copper oxychloride (3.0 g/l) or Bordeaux mixture (1%) or Copper hydroxide (2.0 g/l) or Fosetyl-Al (2.0 g/l) or Dimethomorph (2.0 g/l) combination of Pyraclostrobin + Metiram (2.0 g/l) or Mefenoxam + Copper hydroxide (2.0 g/l) or Metalaxyl 8% + Mancozeb 64% (2.0 g/l) during clear weather condition.

Live Stock Specific Advisory:

Live Stock(Varieties)	Live Stock Specific Advisory
BUFFALO	• Keep animals in shade and give them plenty of clean and cold water to drink. Do not make them work between 11 am to 4 pm. Cover the shed roof with straw, paint it white or plaster with dung-mud to reduce temperature. Use fans, water spray and foggers in the shed. During extreme heat, spray water and take cattle to a water body to cool off. Give them green grass, protein-fat bypass supplement, mineral mixture and salt. Make them graze during cooler hours.
COW	• Dairy cows should be given 8 kg of dry fodder + 6 kg of green fodder and 1 kg of concentrate feed per day. Maize, sorghum, millet, wheat bran should be used while making the concentrate feed. The concentrate feed should be mixed with mineral mixture at the rate of 20 grams of per kg of concentrate feed.
GOAT	• Vaccinate the goat against FMD, HS, PPR and enterotoxaemia. Offer clean and cold water (stored in earthen pot) to the animals. Keep the livestock under the shed to protect from heat and lightning.

Poultry Specific Advisory:

Poultry(Varieties)	Poultry Specific Advisory
BIKD	• To get the protection against heat, provide curtains and proper ventilation in poultry house.

Others (Soil / Land Preparation) Specific Advisory:

Others (Soil / Land Preparation) (Varieties)	Others (Soil / Land Preparation) Specific Advisory
GENERAL ADVICE	• At the time of purchasing seed, farmers are advised to check the detail on tag/label such as, name of crop, crop kind, variety, physical and genetic purity percentage, germination and inert matter percentage, net weight, lot and batch number, date of testing and packing, maximum retail price, moisture percentage etc. • Take the original bill from the seller and ensure that the signature on bill of both seller and seed purchasing farmers.
GENERAL ADVICE	• Farmers should take care of thunder and lightning in the sky: If you are working in the field, take shelter immediately near the field. After taking shelter in a safe place in the field, keep dry wood, plastic, gonapath, dry mulch under the feet. Sit with both feet together and both hands on your knees. Make sure that no part of your body touches the ground except your feet. Individuals working in ponds, such as places where there is moisture in the soil or water sources, should go to a safe and dry place immediately. If there are tall trees nearby, take shelter at a distance twice the height of that tree. • A pucca house is the safest place to avoid lightning. Farmers should plant trees as low as possible around their houses and livestock sheds. Moist, swampy places and water sources (wells, lakes, rivers, farm ponds etc.) should be avoided as much as possible. If traveling in a four-wheeler, stop in the vehicle. Farmers should take care that they do not have any metal tools. When working in the field, do not let more people work together at the same time. Care should be taken to keep a distance of at least 15-20 feet between two persons. Do not use an umbrella with a metal rod. Stay away from other electric tools made by farmers as well as metal ones.
GENERAL ADVICE	• It should be noted that the validity of the dates mentioned in the Weather Based Advisory Bulletins will be valid up to 08:30 AM of the mentioned date.*Based on a research trial that was not included in the CIBRC label claim. # Under label claim.