



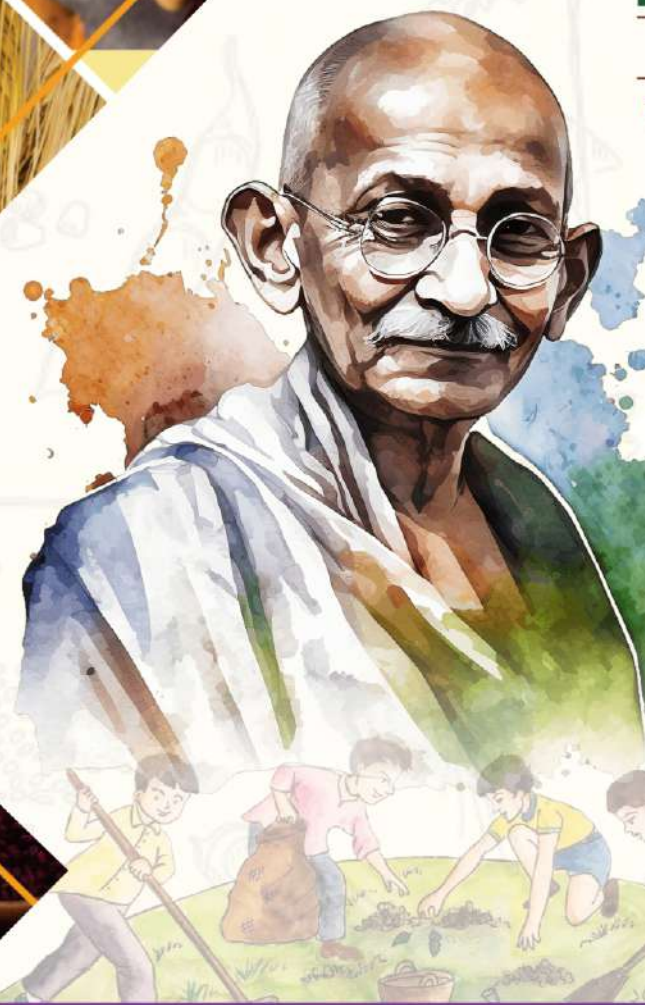
# KVK TIMES

A Window to KVKs of ICAR - ATARI, ZONE-XI

Vol. 02

Issue 07

1<sup>st</sup> to 15<sup>th</sup> October 2023



## JAI JAWAN KISAN



Farm Innovator

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(University of Agricultural Sciences, Raichur)





# Foreword

**Dr. V. Venkatasubramanian**  
Director, ICAR-ATARI Zone XI Bengaluru

Krishi Vigyan Kendras are playing pivotal role in handholding of farmers through technological backstopping for enhancing the productivity of crops and enterprise keeping in mind profitability and sustainability. 'Believing through seeing' and 'Learning by doing' is most appropriate to the KVKs, as the Scientists and farmers are jointly involved in implementing KVK mandated activities to reach the mission of enhancing the farmers income. KVKs are expanding the horizon from elite extension to innovation, market linkage, FPOs, processing and value addition. 48 KVK's in Zone XI of ATARI placed in states of Kerala, Karnataka and Lakshadweep Union Territory has immensely contributed in enhancing agriculture productivity and farmer income thus ensuring sustainable social and livelihood security of farm families.

A first of its kind virtual platform, KVK TIMES which documents fortnightly activities of each of the 48 KVKs of Zone-XI is gaining a real momentum. The news items covered in issues made an impact that is long lasting. Most of the news items published in the TIMES has got the potential of cross learning among KVKs and worth reading. This should boost the morale of all of us and many such noteworthy efforts of our fraternity in the zone.

I am happy that KVK Bidar is bringing up the 7<sup>th</sup> issue of second volume of KVK TIMES covering the First fortnight of October 2023. I congratulate the KVK fraternity of Zone XI specially Dr. Sunilkumar.N.M, Senior Scientist and Head and his team of KVK, Bidar for bringing out this unique edition of KVK Times.

V Venkatasubramanian



# Foreword

**Dr. M. Hanumanthappa**  
Vice Chancellor, UAS Raichur

Its with great pleasure and a sense of profound appreciation that I extend my warmest greetings to all those involved with the ICAR-Krishi Vigyan Kendra, Bidar, and the remarkable initiative they have undertaken through the KVK Times. The tireless dedication and commitment displayed by this institution in documenting the endeavors and success stories of various Krishi Vigyan Kendras (KVKs) across the Zone XI deserve our heartfelt commendation.

The Krishi Vigyan Kendra system, as envisioned, stands as a beacon of progress and a bridge between scientific research and its tangible application within the farming communities. The profound significance of KVKs cannot be overstated, for they are the engines that drive innovation, transform traditional practices, and enable agricultural development. At the core of this transformation is the concept of 'seeing is believing' and 'learning by doing.' By adopting these principles, KVKs bring the world of science to the fields of farmers. Through practical demonstrations and hands-on experiences, these institutions make scientific knowledge accessible and comprehensible to those who till the land. This approach not only enhances agricultural productivity but also empowers farmers by creating self-employment opportunities and fostering a spirit of self-reliance.

The focus of ICAR-KVK, Bidar, on crop diversification, livestock and horticulture is not only in sync with the current trends in agriculture but is also a testament to the forward-thinking approach adopted by this institution. These sectors not only contribute to increasing farmers' income but also serve as significant sources of employment, thereby bolstering the overall economy of the region. Collaboration lies at the heart of any significant endeavor, and in the realm of agriculture, it is an absolute necessity. The seamless cooperation between research institutes, farmers, and KVKs, bolstered by the active involvement of local administration, forms the cornerstone of agricultural development. This synergy ensures that the latest scientific advancements are disseminated to the grassroots level, directly benefiting the farming community and promoting sustainable agricultural practices.

The current issue of KVK Times spotlights the invaluable contributions of farmers in the realm of low-cost, technically sound, and farmer-friendly innovations. It is a testament to the KVK Bidar scientists and their counterparts in various KVKs for their unwavering dedication to providing the necessary information regarding these innovations. Recognizing and celebrating such grassroots innovations is a fitting tribute to the spirit of ingenuity and resourcefulness that defines our farmers. I wholeheartedly commend ICAR-KVK, Bidar, for their relentless commitment and applaud their relentless efforts to enrich the livelihoods of our farmers. The progress of agriculture is not just essential for food security but also for the economic prosperity of nations. Institutions like ICAR-KVK Bidar play an irreplaceable role in advancing these critical objectives, and their work is nothing short of invaluable.

I wish ICAR-KVK, Bidar, continued success in their endeavors and express my hope that they will continue to light the way for agricultural progress.

**Dr. M. Hanumanthappa**



## UNIVERSITY OF AGRICULTURE SCIENCES, RAICHUR



**Dr. S. B Goudappa**  
Director of Extension

### Message

It is with great pleasure that I introduce the "KVK TIMES" e-newsletter, a commendable initiative by the Indian Council of Agricultural Research (ICAR), specifically, the Agricultural Technology Application Research Institute (ATARI) Bengaluru, Zone XI. This publication is a testament to the unwavering commitment of Krishi Vigyan Kendras (KVKs) across the country in transforming agriculture and enhancing the lives of our farmers.

In the realm of agriculture, the role of KVKs is nothing short of indispensable. These centers, situated in the heart of farming communities, serve as the vital bridge between the scientific innovations emanating from our research institutions and the fields where our dedicated farmers toil day in and day out. KVKs are the repositories of knowledge, and they ensure that this knowledge reaches the very individuals for whom it is intended – our farmers.

The essence of this "silent revolution" lies in the ability of KVKs to effectively employ creativity and Information Technology and Communication (ITC) methods to disseminate valuable information. Through these means, KVKs empower farmers with the latest agricultural practices and technological advancements. This not only leads to increased crop yields and enhanced crop quality but also serves to reduce production costs and alleviate the arduousness associated with farming. KVKs, in their role as knowledge hubs, inspire farmers to organize themselves, explore new market opportunities, and equip agricultural laborers with the skills necessary to thrive in the evolving agricultural landscape.

The significance of this transformative force cannot be overstated. As we work relentlessly towards the ambitious goal of doubling farm income, KVKs stand at the forefront, making this vision a tangible reality for our farming communities. Their tireless efforts are helping us overcome the challenges that agriculture faces today.

It is, however, the remarkable activities of KVKs that often remain hidden from various organizations. This is where the "KVK TIMES" e-newsletter comes into play. Through this publication, we aim to cast a spotlight on the exceptional work being carried out by KVKs. It is a platform that celebrates their achievements, shares success stories, and provides insights into the groundbreaking innovations that are taking place at the grassroots level.

I extend my heartfelt appreciation to the entire team at ICAR-ATARI Bengaluru, Zone XI, for their foresight and dedication in bringing this e-newsletter to fruition. It is our hope that "KVK TIMES" will serve as an invaluable resource, a source of inspiration, and a platform for the exchange of knowledge and ideas for all stakeholders in agriculture.

I encourage everyone to explore the pages of this e-newsletter and to join us in celebrating the silent heroes of Indian agriculture - the KVKs. Together, we can empower our farmers, boost agricultural productivity, and contribute to the overall growth and prosperity of our nation.

**Dr. S. B Goudappa**



## UNIVERSITY OF AGRICULTURE SCIENCES, RAICHUR



**Dr. Sunilkumar N.M.**  
Senior Scientist & Head ICAR-KVK, Bidar



### Acknowledgment

It's truly delightful to learn about the involvement in compiling and editing the 'KVK TIMES' for the 154th Birth Anniversary of Mahatma Gandhiji, leading up to the 'Swachhata Pakhwada - Swachhata Hi Seva' 2023 campaign & Birth Anniversary of Lal Bahadur Shastri. Our expressions of gratitude and recognition for those who have supported and guided us in this endeavor stand as a testament to unwavering dedication and commitment to the cause. Expressing appreciation and giving credit to all those who have played a part in the success of such initiatives is of utmost importance.

I would like to express my heartfelt thanks to the Honorable Vice-Chancellor Dr. M. Hanumanthappa, University of Agricultural Sciences, Raichur for his guidance and constant support in carrying out our KVK activities in serving the farming community and bringing out this memorable issue.

I avail this opportunity for the encouragement and motivation provided by respected Dr. V. Venkatasubramanian, Director of ICAR-ATARI, for overwhelming support and valuable suggestions for all the kvk activities and also in bringing this issue. I also express my sincere gratitude and respects to Dr. M. J. Chandre Gowda, Principal Scientist, Dr D. V Srinivas Reddy, Principal Scientist ATARI, Bengaluru, Dr.B.T.Rayudu ,Principal Scientist, Dr.K.Thimmappa, Principal Scientist, Dr D.V Kolekar Scientist, and Dr.Mallikarjun B.Hanji Chief Technical Officer ATARI, Bengaluru in demonstrating the culture of teamwork and partnership within institution. It's truly commendable that we value not just the leadership, but also the entire scientific and administrative team at ATARI, Bengaluru.

We extend our heartfelt appreciation to the calm and inspiring leadership of Dr. S. B Goudappa, Director of Extension, University of Agricultural Sciences, Raichur. We also express our gratitude to the dedicated efforts of staff members, including Dr. D.K Hadimani, Dr. Hanumanth Nayak, and Dr. Mallikarjun for collective teamwork has been the cornerstone for this success."

We extend our heartfelt gratitude to all those who made this issue of KVK Times possible. We wish to express our profound appreciation to the scientists at KVK Bidar, as well as our counterparts in various KVKs, for their unwavering dedication in providing essential information on farmers' innovations and KVK activities. The invaluable contributions of our dedicated farmers in the domain of low-cost, technically sound and innovations are the very essence of this publication.

I take immense pleasure in expressing my heartfelt gratitude to Smt. Jyothi Kamthane, Senior Technical Officer KVK Bidar for her unwavering dedication and tireless efforts have been instrumental in the success of Krishi Vigyan Kendra, Bidar activities. Moreover, her professional expertise in designing and layout has added a touch of excellence to this work. I extend my sincere appreciation for her invaluable contributions and remarkable commitment

In closing, we extend our heartfelt gratitude to Mr. Shivkumar of Patil Computers, Bidar, for his exceptional contribution to the design of this newsletter. This acknowledgment underscores the pivotal role of creativity and design.

My expressions of thanks not only convey personal humility but also underscore the significance of teamwork, collaboration, and the invaluable support of others in achieving our shared goals. It's evident that we highly value the contributions of every individual involved in this outcome, fostering a spirit of teamwork and camaraderie. Congratulations on your pivotal role in this significant endeavor, and we look forward to its continued success.

**Dr. Sunilkumar N.M.**

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Dedicated to

## FARM INNOVATORS

*Our innovative farmers are the unsung architects of a brighter tomorrow*

*"The true wealth of a nation lies not just in its grand achievements but in the resilience, ingenuity, and resourcefulness of its farmers, who sow the seeds of innovation that bloom into prosperity. KVK Times salutes these unsung heroes and the scientists who nurture their dreams."*

Innovators  
Corner





# KVK bidar at a Glance



Welcome To ICAR-KVK Bidar

## KVK BIDARS DEMONSTRATION UNITS



Vermicompost Unit



Azolla Unit



Panchagavya



Nursery Unit



Vermi Wash unit



Farm pond



Zero Energy chamber



Rain water harvesting unit



Poultry Unit



Terrace Garden



Crop Cafeteria



## KVK BIDARS DEMONSTRATION UNITS



Turmeric Boiler



Tractor Drawn Onion Seeder



Millets Processing Unit



Mango Ripening Chamber



Onion Storage Structure



Hydroponics Unit



Exhibition Hall



SWTL Lab



Training Hall



Exhibition Hall



Mango Special Production Unit



Bio Fuel Unit



Poultry Unit



Red Chili Solar Dryer



ICAR - KISHI VIGYAN KRENDA, BIDAR



Display Unit



Display Unit



## ICAR-KVK BIDAR

### Millets Field Day- Excellent platform for knowledge sharing.



The field day of Millets conducted by the Krishi Vigyan Kendra (KVK) Bidar through a Front Line Demonstration on Integrated Crop Management at Morambi Village in Bhalki Taluka on 18th October, 2023 was an insightful event that brought together the farming community to showcase the potential of millet cultivation. KVK Bidar took the initiative to demonstrate the cultivation of various millet varieties, including foxtail millet, barnyard millet, kodo millet, and little millet, each covering an area of 5 hectares. This effort impacted a total of 48 farmers in the region.

The field day began with a warm welcome by Dr Gnyandev Bulla Scientist ( Seed Sciece and Technology) KVK Bidar, highlighting the importance of millets in promoting sustainable agriculture and nutrition. The attendees were provided with hands-on experience and practical knowledge about millet cultivation techniques. Dr Sunilkumar N.M Senior Scientist and Head KVK Bidar shared best practices for soil preparation, seed selection, pest and disease management emphasizing Integrated Crop Management.

The farmers had the opportunity to witness the different millets cultivation plots, and were encouraged to ask questions and seek clarification. Demonstrations included the use of advanced farming technologies and modern machinery to enhance millet production and they were told about millet processing that facility is already present with KVK Bidar. The event also stressed the significance of millets in terms of their resilience to adverse environmental conditions and their potential to improve the income and food security of farmers.

In conclusion, the farmer Mr Virshetty Prabhurao expressed happiness for havig done the demonstration and told that the Millets Field Day by KVK Bidar served as an excellent platform for knowledge sharing and capacity building among the farming community. The event underscored the importance of millets in promoting sustainable agriculture and improving the livelihoods of rural communities.

### Visit to Rose FLD on Integrated Pest Management by KVK Bidar scientists

The Scientists from KVK Bidar showcased an exemplary approach to Integrated Pest Management in Rose through FLD. They emphasized the vital role of blue and yellow sticky traps in thrips and other sucking pests management, expertly explaining their installation and strategic placement to monitor and control pests effectively. The time and spraying methodology was discussed during the demonstration and demonstrated how precise application of pesticides can reduce environmental impact. This is how the KVK Bidar in promoting sustainable and eco-friendly practices for the benefit of rose growers in the district.



### Innovation of

### Man Operated Automatic Seed Drill



**Sri. Somashenkar Karimungi**

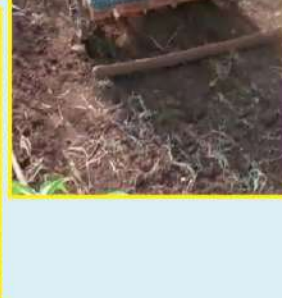
R/o Hudgi, Tq. Humnabad,

Cell : 9343057351

This Machine is designed using the spare parts of tractor drawn sowing machine, it costs hardly Rs.2000/- but in the market such machines are available at Rs. 6000/- to Rs. 7000/-.

#### Advantages :

1. No need of bullocks, tractor or machines for sowing, one person he himself can operate it.
2. Suits very well for small farmers.
3. Can be very well used for sowing in between the rows of main crops.
4. Used for sowing of Redgram, Maize, Coriander, Fenugreek, Onion.
5. Per day 4 to 5 acres of Redgram and 2 to 3 acres of Onion and Coriander field can be sown.
6. It can be used for applying Fertilizer also.





## ICAR-KVK ALAPPUZHA

**Annual General Body Meeting of 'Onattukara Spices' company promoted by the KVK**



8<sup>th</sup> Annual general body meeting of 'Onattukara Spices Farmer Producer Company Limited (OSFPCL)' promoted by ICAR-KVK-Alappuzha was inaugurated by Mr. M.S. Arunkumar, MLA, Mavelikkara on 27.09.23. Receiving grants from NABARD, the farmer producer company was registered in 2016 for the benefit of spice farmers which deal with scientific production, procurement, processing, value addition and marketing of major spices viz., turmeric, ginger, pepper and garcinia in the district. The company has 401 share holder farmers from Bharanikkavu, Mavelikkara, Muthukulam and Chengannur blocks. During the harvesting season of 2023 the company procured seed material of turmeric variety Prathibha (22571kg) and ginger variety Varada (5939 kg) worth Rs.16 lakhs from share holder farmers and made available to farmers and other agencies of Alappuzha and adjoining districts. Smt. K. Deepa, President, Bharanikkavu grama panchayath, Dr. P. Muralidharan, PS and Head, KVK, Smt. Rajini Jaydev, Managing Director, OSFPCL, Smt. Pooja V Nair, Agricultural Officer, Bharanikkavu, Sri. E S Anandan, Sri. Salim Kaithavana, Sri. M. Soman, Sri. Gopalakurup, Directors of OSFPCL and Sri. M S Rajeev SMS (Agronomy), KVK- Alappuzha spoke on the occasion. More than 125 share holder farmers attended the AGM which other than the mandatory agendas resolved to diversify the activities and enhance the infrastructure of the company.

**(M.S.Rajeev, SMS and P.Muralidharan, Head)**

Innovator's  
Corner



**Innovation of  
Floating Duck Shed To Overcome  
Flooding Situations**



**Sri Stanly Baby Thottakkattuparambil  
P o. Thalavady, Cell: 7025424288**

During the historic flood occurred in Kerala in August, 2018 Mr. Stanley Baby lost his entire crop, birds and fishes he has been nurturing since 2015. This instigated him to develop flood resistant mechanisms for farming. Being a partner farmer of the 'Integrated duck and fish farming' demonstration under NICRA project implemented by KVK-Alappuzha in Thalavady, he preferred a floating type of duck shelter instead of fixing the shelter above the fish pond. As the first step, he fabricated a duck shelter using GI and PVC pipes, and Trafford sheets in 8 x 5 x 7 ft size and fixed over sealed plastic barrels (4 barrels, one on each side) for floating. This shelter floats freely on water which rises along with the water level and is tethered with a long rope. For feeding the ducks and collection of eggs, the shelter is pulled near the bund using the rope and then released back. The floor of the shelter is made by paving PVC pipes (3/4") on a gap of 1.5 cm which allows the faecal materials of duck to drop down, which could indirectly form feeding material to the fish. This PVC pipes are durable and last for more than 20 years. By this innovation, he could save his birds from the floods occurred in the succeeding years. He houses about fifty indigenous layer ducks (Chara & Chemballi) in this shelter and rear Opheocephalus (Varal) and other local fish varieties in the pond. By this innovation, Mr. Stanley Baby is confident of rearing ducks throughout year without the fear of flood and earning a reasonable income from the enterprise.



**'Swachhta Hi Seva'**

**Campaign organized for school students**



KVK-Alappuzha organized 'Swachhta Hi Seva' campaign for Vocational Higher Secondary (Agri.) students in GVHS School in Thalavady as part of the national campaign from 2<sup>nd</sup> to 31<sup>st</sup> of October, 23. The awareness programme on 'Bio-waste management in School campuses' was conducted highlighting the relevance of maintaining a hygienic surrounding and cleanliness in school campus and premises. Method demonstrations on (i) Preparation of activated EM solution and (ii) use of vermibed for bio-waste management were carried out for hands-on-experience. Forty six students and four staff members participated in the programme. The students prepared activated EM solution from the stock solution by mixing with jaggery and keeping for activation. The vermibed was fixed, and bio-wastes (mainly dried leaves) from school premises were collected and heaped and ready to use formulation of EM solution was sprayed on it. The low cost method of *in situ* composting of farm wastes was also carried out using ready to use formulation. By these activities, the students were empowered to take up the composting activities in their homesteads and public places as part of the nationwide campaign on "Swachh Bharat".

**(K. Sajnanath, SMS)**



## ICAR-KVK BAGALKOTE

### Meeting on drought hit areas of Bagalkote district:



Dr. D. N. Kambrekar, Senior Scientist and Head attended meeting at the DC office, Bagalkote regarding preparation to be made to showcase the drought hit areas in Bagalkote district on 03-10-2023.

### Shri Shrinivas Kottayan, Hon'ble board member of UAS Dharwad visited KVK Bagalkote:

Shri Shrinivas Kottayan, Hon'ble board member of UAS Dharwad visited KVK Bagalkote on 03.10.2023. He visited KVK Farm, Nursery unit, Vermi Compost unit, Dairy unit, Seedhub unit, KVK Museum, Soil Lab and Bio Control Lab. He interrogated with the all staff of KVK Bagalkote and farm labours, contractual staff. During his visit Dr. D. N. Kambrekar, Senior Scientist and Head, Dr. Sudha S, Scientist (Plant Protection), Dr. Siddappa C Angadi, Senior Technical Officer and supporting staff were present at this occasion.



Innovator's  
Corner



### Innovation of New Sugarcane Harvesting Machine



Sri. Siddu Shankarappa Chaudhary  
Lokapur Tq. Mudhol, Cell : 8088268996

- \* The special feature of this machine is that the sugarcane is not cut into pieces like other machines, but remains in a long pile.
- \* Farmer invested an amount of around 94-95 lakhs and made this machine as a reflection of three years of hard work.
- \* As compared to other, this machine reduces losses and benefits the farmers.
- \* The machine is light in weight (4-5 ton) suitable for working in agricultural land.
- \* This machine can be manufactured for around Rs 50 lakhs which is the lowest price among the machines available for sale.



### Visit of Dr. S. S. Angadi, DE UAS, Dharwad

Dr. S. S. Angadi, Director of Extension, UAS Dharwad visited KVK Bagalkote on 04.10.2023. He visited KVK Farm, Nursery unit, Vermi Compost unit, Dairy unit, Seedhub unit, KVK Museum, Soil Lab and Bio Control Lab. He interrogated with the all staff of KVK Bagalkote and farm labours, contractual staff. During his visit he reviewed the ongoing OFTs, FLDs, CFLDs, Farm Trials and Adhoc projects suggested the staff for smooth conduct of KVK. Dr. D. N. Kambrekar, Senior Scientist and Head, Dr. Sudha S, Scientist (Plant Protection), Dr. Siddappa C Angadi, Senior Technical Officer and supporting staff were present at this occasion.



### Conducted Survey Along with Inter Ministerial Central Team (IMCT) to drought prone talukas of Bagalkote district:

Dr. D.N.Kambrekar, Senior Scientist & Head conducted survey along with Inter Ministerial Central Team (IMCT) to drought prone talukas of Bagalkote on 07-10-23





## ICAR-KVK BALLARI

### Scientists of ICAR-KVK Ballari visits to drought affected fields

During the monsoon season of 2023-24, five taluks in the Ballari district were reported to be seriously affected by the drought. Under the leadership of the Joint Director of Agriculture, Department of Agriculture, Ballari, a committee including scientists from ICAR-KVK, Ballari visited farmer fields in drought affected taluks of the Ballari district and assessed the yield loss in various crops. The majority of the kharif crops such as groundnut, cotton, sunflower, maize in rainfed cropping system were severely affected and exhibited complete stunted growth resulted drought scenario in entire taluks of Kudligi, Sandur and parts of Ballari. The average actual monsoon rainfall received from April to August 2023 is 181.5 mm which is very much short fall as compare to normal rainfall of 200 to 350 mm. As it is less than that, rain-fed agricultural crops (cereals, pulses, and commercial crops) experience stunted growth and major yield loss. In addition, the lack of rain has resulted in dryness of Tungabhadra river and Vedavati (Hagari) river canal water in Ballari and Siruguppa taluk, resulted the crops grown along the river banks including paddy, cotton, chilli, pearl millet, maize and sugarcane are severely stunted, wilted completely and their yield has hampered. Because of the extremely low rainfall, crop yield is affected to the extent of 85 to 90 per cent. The comprehensive report has been submitted to Director of Research, UAS, Raichur for onward submission to Under Secretary, Govt. of Karnataka.



**If agriculture fails, everything else will fail !**  
- M.S. Swaminathan  
Father of India's Green Revolution



Innovator's  
Corner



### Innovation of Monkey Gun



**Sri. S.H.M. Basaiah Swamy S/o Kotraiah**  
Kaddi Rampura Tq. Hosapete Cell: 94491-33154

Looking into the success of the gun in scaring away the monkey troops, the farmers known to Basaiah swamy have started using it to protect their crops from the monkeys. Many opine that crop loss to the tune of 20% is saved just by using the gun. Langurs, easily get scared by the sound of the gun and stay away from the fields for longer duration unlike Hanuman monkeys which are stubborn and return back in 2-3 days. But firing at them again will also keep them at bay for a considerable period. Basaiahswamy assembles new guns and sells them at Rs. 1,000 per gun and as of now, he has sold 175 to 200 guns. Farmers of Ballari and Koppal district have purchased guns to scare monkeys away to protect their maize crop. Farmers from Joga and Bandri of Sandur area are using this gun even to scare away the wild boars that destroy their crops. Birds which prey on fishes in fish pond are also scared away with help of this gun as opined by some of the Andhra Pradesh farmers.





## ICAR-KVK BELAGAVI- I

### KISAN GHOSTI PROGRAM AND RABI SEASON CROP PLANNING

ICAR BIRDS Kendra, Belagavi-1 (Tukkanatti) has organised Kisan Ghosti and Scientist and Farmers interaction in KVK jurisdiction taluka villages. The selected villages from the talukas are Kavalgud (Athani), Waderahatti (Mudalagi), Mastiholli (Hukkeri) and Umarani (Chikkodi).

Main objective of the program is to know drought effect on Kharif season crops and Rabi season crop planning. Each Scientist taken responsibility of one taluka. For organising this program taken support from Gram Panchayat and invited all the line department officials. Taluka line Department officials are participated during the program discussed about availability of seeds, fertilizer, insecticides and pesticides in Raitha Samparak Kendra's and Horticulture department officials explained about Farm Pond construction, Nursery Establishment, MNREG plantation program and Drip subsidies.

After the introductory remark of the guests and officials' farmers and scientist interaction was carried out. During the discussion farmers have asked about the Production issues like Nutrient Management, Cropping system in Sugarcane, Turmeric, Diseases and Pests in Crops and livestock issues in respective villages to our KVK Scientist. At the end of the program drawn rangoli map of above selected villages.

Shri. R. M. Patil, Chairman KVK, Belagavi-1 addressed all the program and suggested all participant farmers to plant 5 fruit tree plants to each family and save environment. Dr. D. A. Mhetre, Senior Scientist & Head and all the Scientific and Supporting staff of the KVK, Belagavi-1 are actively participated in each taluka program. 70 farmers of each village are addressed. It is four days event one day for one selected village from 4 talukas, totally 258 farmers and farmer women are participated and given their inputs in the event and made the successful event.



Innovators  
Corner



### Innovation of Turmeric Mechanization



**SRI. LAXMIKANT SOLLAPUR,**  
Duradundi, Tq. Mudalagi Ph: 9880369265

- \* Mr. Laxmikant Sollapur is 'Star Farmer' known for his innovations in Mechanization and Organic farming.
- \* Designed Tractor drawn turmeric Rhizome Sower and Tractor drawn turmeric Harvester which is now being used more than 50 acres.
- \* These mechanized innovations saves labor cost by 70% and time by 80%.
- \* Modified 'Dashaparini' and 'Eggamruta' is giving good result in pest management in Papaya.





## ICAR-KVK BELAGAVI- II

### Krishi Sakhi Training Programme

ICAR-KLE Krishi Vigyan Kendra, Mattikoppa in association with Karnataka State Rural Livelihood Promotion Society, Department of Skill Development, Entrepreneurship and Livelihood, Bengaluru and Zilla Panchayat, Belagavi organized First training module on Agro-ecological Practices for Community Resource Persons of Farm Livelihood (Krishi Sakhi) from 9 – 14 October, 2023 for 70 selected Krishi Sakhi from 02 taluks of Belagavi District. The programme was inaugurated by Shri Ravi N. Bangareppa, Project Director, Zilla Panchayat, Belagavi during his inaugural speech, he addressed awareness about different government schemes and Krishi Sakhi's should act as bridge between the farming community and line departments, KVK and Village level extension workers for effective Transfer of Technology (ToT) for increasing the productivity. The programme was presided over by Shri. B.R. Patil Chairman, ICAR KLE Krishi Vigyan Kendra, Mattikopp & Director, Board of Management, KLE Society, Belagavi. Training of Krishi Sakhi is a unique programme which will help to educate farmers at field level to guide them for appropriate action on time. Scientists of KVK are well experienced and will certainly train in all aspects of trainees and will ensure livelihood security at the village level. Mrs. Sridevi B. Angadi, Senior Scientist and Head expressed training programme schedule for 6 days was planned systematically and the training area included right from importance of soil testing, soil sampling methods to pest and disease management in major field and horticulture crops of the district. Apart from that knowledge on nutrition gardening, importance of millets and millet based balanced diet and value addition of field and horticulture crops, information on first aid treatment was also demonstrated by Ayurveda Doctors. The valedictory programme was held on 14 October, 2023. This types of trainings will help KVK to disseminate the technologies at grass root level more effectively and at the end of day certificates provided to Krishi Sakhis.



### Technology Week

KVK organized 'Technology Week' from 9 – 14 October 2023 at the KVK campus. The main objective of the week was to showcase the various varieties of field/horticulture crops and recent technologies to farmers/farm women/rural youths. A series of lectures was arranged on plant protection, IPM modules, eco-friendly pest management, plant based pesticides, integrated farming system, natural farming, horticulture nursery raising techniques and processing and value addition of field and horticulture crops. Soil Scientist highlighted about the importance of natural farming, soil fertility status and method demonstrated preparation of Jeevamruth, Beejamruth, farmers and farmwomen has visited crop cafeteria and got the information about 22 crops with 138 varieties Scientist (Agronomy) briefed about varietal characters, agronomical practices like seed rate, spacing, integrated nutrient, weed and water management practices. As the year 2023 is celebrating as international year of millets (IYOM). In this context, KVK has showcased 9 millets with 45 varieties at crop cafeteria. Exotic vegetables like broccoli, red cabbage, Chinese cabbage, pakchoi, cale, zucchini, pole beans and also regular vegetables like chilli, capsicum, brinjal, flower crops like gladiolus, china aster, marigold etc., The farmers and farmwomen attending technology week took the round of crop cafeteria maintained at the KVK. They also visited different demo units maintained at the KVK viz., mother block orchard : mango, sapota and guava, Commercial orchard: curry leaf + mango, amla + lime, custard apple, guava, New commercial orchard: high density of planting – mango, high density plantation of cashew varieties, high density plantation of jamun, jack fruit orchard, shade net, agro-forestry unit, vermicomposting unit, fodder unit, dairy unit and goat unit. A total 650 farmers/farm women/rural youths were benefitted by the programme.





## Celebration Mahila Kisan Diwas

KVK organized Mahila Kisan Diwas on 15 October, 2023 at ICAR KLE Krishi Vigyan Kendra, Mattikopp with the theme of "Rural women cultivating Good Food For All". The programme was inaugurated by Dr.S.S. Hiremath, Scientist (Plant Protection), addressed the gathering on role of farmwomen in agriculture. Women are of vital importance to rural economics. Women comprises 33% of agriculture labour force and 48% of self employed farm in India. With growing migration by youths/men, the agriculture sector is being managed by women. Women contribute to agriculture through multiple roles as cultivators, entrepreneurs and labourer. Shri G.B. Vishwanath, Scientist (Agronomy) trained on drudgery reducing equipments and practically demonstrated at the campus. He expressed the activities farm mown indulged are drudgery prone and drudgery reducing equipments have been described at various SAUS/institutes which help them to do agriculture activities hassle free. Shri S.M. Warad, Scientist (Soil Science) believed that farm women are equally capable of performing agriculture activities as equivalent to men.



Innovator's  
Corner



Innovation of

## Farm Machineries



### Sri Kallappa K. Mutnal Itagi, Tq. Khanapur, Cell: 6360959810

- \* Farmer designed power tiller mounted with dozer at front and rotavator at rear end.
- \* Farmer designed power tiller mounted combined rotavator, seed drill and seed cover.
- \* Power tiller mounted dozer fitted at front will be pushing the soil from high gradient to low gradient slope.
- \* Power tiller mounted combined rotavator, seed drill and seed cover.
  - i. Rotavator will churn the pre-ploughed soil
  - ii. Seed cum fertilizer drill will be used for the placement of seed and fertilizer into the soil.
  - iii. Seed cover will be used for covering the seed and fertilizer after placing into the soil at proper depth.



## Special Swachhata Campaign 3.0 (3-31 October 2023)

KVK organized Special Swachhata Campaign 3.0 to Krishi Sakhis of Khanapur & Belagavi talukas, Organic Farmers and SHG groups. This campaign was launched on 2<sup>nd</sup> October 2023. This campaign main objective is to create awareness among the farmers, KVK is giving priority and responsibility towards cleanliness, focus on eradicating unhealthy practices and provide basic sanitation facilities by giving tracing on solid-liquid waste disposal systems. ICAR-KLEKVK staff, farmers and SHGs taking oath on Swachhata and dedicated 100 hours/year to the mission. KVK also conducted method demonstration, trainings for microbial based agriculture waste management using vermicompost techniques, use of eco-friendly management of pest and diseases in agriculture and horticulture crops (pheromone traps, sticky traps and bio-agents). KVK provided orientation programme to the school children and college students from different institutes of KLE Society, Belagavi topics like hygiene, sanitation and cleanliness.





## ICAR-KVK BENGALURU RURAL

### Central Team of Experts surveyed the drought affected areas

A team of officials headed by the Director of the Central Water Commission has visited the severe drought affected areas in Bengaluru Rural District on 08.10.2023. Mr. Ashok Kumar, V., Director, Central Water Commission, Mr. Karan Chaudhary, Deputy Director, MNCFC, Mr. Sangeet Kumar, Under Secretary to Food & Civil supplies, Dr. G.S. Srinivasa Reddy, Senior Consultant, Revenue Department. Dr. Hanumantharaya, B.G., Senior Scientist & Head and Dr. Venkate Gowda, J., Scientist (Agronomy) of ICAR – Krishi Vigyan Kendra, Bengaluru Rural District was in the surveillance team. The team was welcomed by Dr. Shivashankara, N., District Commissioner, Bengaluru Rural in presence of Line department officials and KVK Scientists.

KVK scientists played a key role in preparation and presentation on crop failure due to drought prevailed in the district. The team visited drought affected fields of finger millet and maize in the district and interacted with farmers and KVK Scientists. The KVK scientists gave scientific evidence for crop loss due to poor germination, stunted growth and less number of tillers per plant. The surveillance team was convinced about the crop failure by the KVK scientists to suitable technical / inputs. The District administrations upheld and applaud the role of KVK scientists played during the drought survey by the Central surveillance team.



**Dr. Hanumantharaya, B.G.,  
Dr. Venkate Gowda, J.  
Dr. Veeranagappa, P.,  
Dr. Dharshinin, G.M.**

### Demonstrated the drone technology during the Bi-monthly workshop



ICAR – Krishi Vigyan Kendra, Bengaluru Rural District organized Bi-monthly workshop in collaboration with Dept. of Agriculture, Bengaluru Rural District on 10.10.2023. The programme was inaugurated by Mrs. Vinutha, Deputy Director of Agriculture, Bengaluru Rural District. Dr. B.G. Hanumantharaya, Senior Scientist & Head, ICAR – KVK, Bengaluru Rural District addressed the gathering and welcomed the all officials of Dept. of Agriculture and Scientists of KVK to the workshop. Dr. Gangadhar Eshwar Rao, Professor (Agronomy), Farmer Training Institute, UAS, Bangalore participated as Chief guest. Dr. Venkate Gowda, J., Scientist (Agronomy), KVK, elicited about the ‘Contingency Crop plan’ for the present drought situation by giving protective irrigation to the crops in distress. Dr. Veeranagappa, P., Scientist (Soil Science), KVK briefed about importance of Soil and water testing and nutrient management in pulse and oil seeds. Dr. Darshini, G.M., Scientist (Plant Protection) delivered lecture on pest and disease management in major field crops of Bengaluru rural District.



### Innovation of Concrete poles - More Flower & Dragon Fruits



**Sri. Jagadish Giri,  
S. Nagenahalli, Tq. Doddaballapur Cell: 9845171449**

- \* Concrete type poles can support the weight of the plants and allow easy access to flower and fruit for commercial production
- \* Reduction in cost: In one acre at the spacing of 10x8 ft, for 500 cement poles farmer invests only Rs. 4,00,000 instead of Rs. 5,50,000 for stone pillars.
- \* More number of plants per pole: 4 plants/pole instead of 2 plants/pole in conventional method
- \* Durability is high: Up to 20 years
- \* Efficient utilization of space and reduced weed menace
- \* Increased yield from plants, average yield from the single pole is realized about 30 to 35 kgs from the three years old planting.





## ICAR-KVK CHAMRAJ NAGAR

### Animal Health Camp

ICAR KVK Chamarajanagara organized and conducted an Animal health camp on 12.10.2023 at Nijalinganapura village of Chamarajanagara taluk under village adoption programme in collaboration with Department of Animal Husbandry and Veterinary Sciences, Chamarajanagara. The programme was witnessed by the treatment of over 100 dairy cattle, sheep and goat of the villagers, aided by a team of veterinary doctors namely Dr. Hanumegowda, Deputy Director, Dr. Shivanna B.S., Assistant Director, Dr. Murthy P. M., Chief Veterinary Officer, Polyclinic, Dr. Lakshmisagar P, Dr. Manohar B. M. and KVK scientists Dr. Mohan Kumar A. B. (Horticulture), Ms. Supriya N. S. (Agril. Extension), Rajath, H. P. (SMS, DAMU), Adharsh N. (Agromet Observer) and Manju S. (Field Investigator). In the programme, veterinary doctors gave awareness about the balanced feed for better animal nutrition, pest and disease management for better health of animals and clean milk production. Also, they suggested to give vaccination to animals from time to time which aids to manage diseases namely ecto and endo parasites, FMD, lumpy skin disease, mastitis, black quarter and etc., KVK scientists provided information on adoption of improved fodder crops and varieties/hybrids for year round availability of fodder emphasizing much on the agronomic practices to be followed for increasing fodder yield and improving fodder quality. Also, the silage preparation for fodder storage to use during lean period was highlighted. Totally, 30 farmers participated in the camp and 4 persons from Veterinary department and 5 from KVK.



### Innovation of Re -Use of Old Fish Catching Nets as Shoot Rearing bed



#### Sri. Shanmugham S/o Mani

Veeranapura Tq. Gundlupete, Cell: 9379157857

Sri Shanmugham S/o Mani, an innovative farmer practicing sericulture since three years in veeranapura and raghavapura villages of Gundlupete taluk, Chamarajanagara district. Instead of using plastic wired threads he replaced the same with old/turned fish nets as shoot rearing bed base. This has helped him to effectively reuse the old nets which are available in nearby gudlur village (border village to Karnataka, Tamil Nadu and Kerala). Further, he has also tried out the use of damaged drip pipes and successfully fitted the same for rearing bed. He is a very hardworking innovative farmer started his earning as landless labour by spraying of chemicals, now he owes 3 acres of sericulture and earned a decent income of Rs. 9 Lakh/annum in 2021-22. He is also a guiding force for neighbouring sericulture farmers.





## ICAR-KVK CHIKKABALLAPURA

Training on integrated crop management in mango was organised by ICAR-KVK, Chikkaballapura at Kutarajanahalli village of Chintamani taluk. Dr. Sandhya, Scientist (Soil Science) explained about nutrient management in Mango. Dr. PraveenaKumar, Scientist (Horticulture) explained about importance of pruning and demonstrated the scientific pruning procedure in mango. Dr. Swathi, Scientist (Plant Pathology) explained about pest management in mango.

Dr. papireddy, Senior Scientist and Head and Mr. Vishwanath, Scientist (Agronomy) participated in meeting about drought situation and visited farmers' fields along with inter-ministerial central team and officials from different departments.

ICAR - Krishi Vigyan Kendra, Chikaballapura organised field day on Eco-friendly management of pest and disease in Tomato at Apegowdanahalli Village of Sidlaghatta taluk on 10.10.2023. Dr. Praveenakumar. R. Scientist (Horticulture) explained about different eco-friendly management practices like enrichment of FYM with biofertilizers, use of yellow and blue sticky cards, spraying of BT to control fruit borer and use of wota-t-trap to manage the pest and diseases in tomato. Shri Hanumanthappa shared his experiences about using the above technologies in getting good quality yield in his field. More than 30 farmers and officials from line department participated programme.

ICAR-Krishi Vigyan Kendra conducted various activities under Swachhta Pakhwada like cleaning of office premises, demonstration plots, pledge and awareness programmes. KVK staff, and farmers actively involved in cleaning activities.



Innovators  
Corner



### Innovation of Adjustable sprayer



**Sri. Ramanji S/o Byrareddy,**  
Yalagere Tq. Chikballapura Cell: 9902991459

Adjustable sprayers are developed by using spraying pipe with multiple nozzles as per the crop requirement and to cover more canopy. This has reduced chemical wastage, labour cost and also reduced the time required for spraying since it covers more canopy. Mr. Ramanji has sold these reinvented adjustable sprayers to the neighbouring farmers and they have expressed positive opinion about the adjustable sprayers.





## ICAR-KVK CHIKKAMAGALURU

ICAR-Krishi Vigyan Kendra, Chikkamagaluru has organized the Blood Donation Camp in collaboration with College of Horticulture, Mudigere and The Lions Club, Mudigere on 06.10.2023 at College of Horticulture, Mudigere.

The Shri. K.T., Devappa, President, Lions Club, Mudigere welcomed the dignitaries addressed the gatherers about the importance and advantages of blood donation.

Dr. Murulidar, District Medical Officer, Chikkamagaluru participated as Chief guests and briefed that, in order to raise awareness about the life saving procedure, this camp promotes blood donation and urges people to save lives by donating blood and if the body loses blood in excessive amounts, people to get deadly diseases and even die hence blood donation camp plays very crucial.

Dr. Krishnamurthy, A.T., Senior Scientist and Head, KVK, Chikkamagaluru, said that blood is one of the most priceless gifts one can give to another and blood is essential for a person to stay alive. Many times, due to accidents or any series emergency condition, a person might require blood and, in those times, people who step to up to donate their blood are real life superheroes.

Dr. Narayan S Mavarkar, Dean College of Horticulture, Mudigere in his presidential remarks said that, this day is quite an important day as it makes people about safe blood. People need to know the importance to be able to donate blood and blood donation has a lot of benefits and importance role during the emergency conditions of the people. Further requested the gathers to donate the blood after fulfilling eligibility criteria. On this occasion Staffs of KVK, College of Horticulture, Mudigere and students actively participated by donating the blood.



*Innovator's  
Corner*



*Innovation of*  
**Minimize Piglets' Mortality By  
Laying Mother Pig On Newly Born Piglets.**



**Mr. Loyd Amar D' Souza**

**Maddenerallu Tq. Chikkamagaluru Cell: 9900431066**

The innovativeness he followed his low-cost simple breeding unit and uniqueness to minimize piglets' mortality by laying mother pig on newly born piglets. The pregnant animal will be identified shifted to breeding cages. The breeding chamber are constructed in such a way that, wall is extended frontside from the side walls in the breeding chamber and at a distance of one-two feet from the side wall and at the height of one feet from the ground all along the breeding chamber. So that one feet passage will be there in the breeding unit. This passage will be utilized by small just grown piglets. The mother pig will be having a habit of laying on ground without seeing to their babies hence mortality will occur. But if this side extended walls are installed in the chamber the piglets will run into the space and hence mortality will be less.





## ICAR-KVK CHITRADURGA

A six days training programme for community resource persons of NRLM project on environment friendly agricultural practices was organized at Krishi Vigyana Kendra, Chitradurga from 9-10-2023 to 14-10-2023 in collaboration with K.S.L.P.S.- Sanjeevini, Zilla Panchayath, Chitradurga. The programme was inaugurated by In charge Officer, Yogesh Babu, Sanjeevini, Zilla Panchayath, Dr. Kumara O., Senior Scientist and Head, Dr. Onkarappa S., Scientist (Plant Protection), Dr. Ravikumar.D., Scientist (Soil Science), Dr. Saraswathi J.M, Scientist (Home Science) along with few trainees by pouring water to the plant.

Dr. Kumara O. during his inaugural speech he briefed the trainees that Krishi Sakhi is a Community Agriculture care Service Provider (CASP) which will enable the last mile coverage in rural areas where farm based services for agriculture activities is not available.

Technical sessions were conducted by the experts all the 5 days and certificates, saree as a uniform and a carry bags were issued to 34 participants in the valedictory programme conducted on the last day of the training programme.

### Centenary Celebration of Agriculture Research station

On the eve of completion of 100 years to Agriculture Research Station, Babburu Farm, Hiriyur, Centenary Celebration programme was organized by ZAHRS and Krishi Vignyana Kendra Chitradurga jointly on 6-10-2023 and 7-10-2023. The programme was inaugurated by honourable Chief Minister of Karnataka Shri Siddaramaiah, honourable Agriculture Minister of Karnataka Shri Chaluvaryaswamy and honourable MLA, District incharge Minister Shri D.Sudhakar and honourable Vice Chancellor, KSNUAHS, Shivamogga, Dr. R C Jagadeesha.

**Dr. Kumara O., Sr. Scientist and Head and Mrs. Kavitha P.Naik,**



### Innovation of Squirrel Management Device



**Sri. Siddesh**  
S/o Basappa Jangli, Palakehalli,  
Tq. Chitradurga, Cell: 9743953465

Here innovative farmer used one plastic disposable water glass and 1.5 feet cotton thread for each plant to contain the squirrel damage in arecanut garden. First he made small hole at the bottom of the plastic water glass almost nearer to center of glass with the help of heated small iron piece. Then inserted one end of the cotton thread to the hole and made big knot outside the glass and another end of the thread run inside the glass and tied freely to the stem of the plant at a height of 5-6 feet and same procedure done for all the bearing plants

Wind pushes the tide water glasses randomly and it makes them to beat the stems of arecanut many times which creates some unpleasant noise and intern repels the squirrel





## ICAR-KVK DAKSHINA KANNADA

### FLD - Kaje 25-9 paddy variety

Paddy is the main food crop in Dakshina Kannada District of Coastal Karnataka. Kaje Jaya is a local popular variety grown in kharif season but its drawback is lesser number of tillers and susceptible to lodging. To overcome these drawbacks, Kaje 25-9 an improve variety developed by Keladi Shivappa Naika University of Agricultural and Horticultural Sciences Shimoga was introduced through Frontline demonstration during Kharif season 2023 at Bambila village of Bantwal taluk. Follow up visits were conducted on 05-10-2023

**Dr Harish Shenoy and Dr. T. J Ramesha**

### Diagnostic Visits to Paddy fields

ICAR- Krishi Vigyan Kendra (Dakshina Kannada) in association with Department of Agriculture, Moodbidre visited the paddy farmers field to diagnose the diseases and advise the management practices. Dr. Kedarnath, Scientist (Plant Protection) from ICAR-KVK (D.K) Mangaluru diagnosed the brown leaf spot disease and advise the farmers to apply propiconazole 25% EC @ 1 ml L<sup>-1</sup> of water or Carbendazim 12% + Mancozeb 63% WP @ 2.5gram L<sup>-1</sup> of water for effective management of the brown leaf spot of paddy diseases. Mr. Yallanagouda (ATM Moodbidre) was also part of the visit.

**(Contributors : Dr. Kedarnath and Dr. T. J Ramesha)**



Innovators  
Corner



### Innovation of Komale's Tree Bike



**Sri. Ganapathi N. K.**

Post Sajipa muda , Tq. Bantwal Cell: 9632774159

Areca is a commercial crop cultivated in the district covering an area of 28,232 ha. To overcome the acute shortage of farmhands in arecanut plantations, timely harvest and spraying of plant protection chemicals involves high drudgery. A farmer-turned-inventor has developed a manually operated tree climbing bike. The 'bike' uses 2.1 BHP motor (weighing 28kg). It can make 100 climbs in 1-litre petrol and help save Rs. 4,000 every day to farmers.





## ICAR-KVK DAVANAGERE

### Training on scientific rearing of Honey bees

Dr. Avinash T. G. SMS (Plant Protection) provided information on Apiculture to volunteers of Pashu Sakhi at KVK. For the training 30 volunteers were participated, precautionary measures to be taken for starting the apiculture was explained. Information on types honey bees, their characters, caste system and their role in building the colony, its maintenance during dearth time, artificial feeding of colony, important pests and diseases of bees and their management practices was provided in detail. Technique of honey extraction and quality checking parameters of honey was shared with the trainees, they also observed live colony maintained at KVK instructional farm.



### Swachhta Hi Seva Special Campaign 3.0

ICAR-Taralabalu KVK Staffs involved in the cleaning of KVK premises as a part of Swachhta Hi Seva Special Campaign 3.0. In the activity polythene covers and other waste materials collected by staffs and waste was disposed safely. Awareness on Swachhta was also created among the neighbours of the KVK. Significance of segregating wet and dry waste, scientific way of waste conversion and also sensitised residents about vermicomposting methods during the Swachhta drive.



### Innovation of Solar Energy Operated Insect Trap



### Sri. Karibasappa M.G.

Malebennur Tq. Davanagere, Mobile: 9880973218

The device is portable, reusable and completely automatic with the use of abundantly available Solar Energy in wide range of agriculture and horticulture crops in different seasons at 1 trap/acre. It is an eco-friendly device and can be used as partial alternative to pesticides in crops, parks, lawns, kitchen gardens, resorts etc. Attracts and kills insects without harming the environment. The specific technology the farmer concentrated here is use of colored light, height of insect flight and the technology used to attract insects (which is under patent registration). The trap can be used in rice, red gram, tomato, brinjal, bitter gourd, ridge gourd, mango, guava, coconut, arecanut, grapes, pomegranate, lemon among other crops. The trap found to be effective against thrips, leaf miners, root grubs, fruit borers, boll worms, stem borers and sucking pests.

The device is under trial in cotton by UAS, Dharwad and outcome is awaited and patent registration of this device is under process by National Innovation Foundation (NIF) – India, Ahmedabad. In the last 3 years the farmer has sold more than 1075 units at Rs. 4,875/ unit in Karnataka, Andhra Pradesh and Maharashtra.



*I will not let anyone walk through my mind with their dirty feet.*

— Mahatma Gandhi





## ICAR-KVK DHARWAD

### Training on coconut cultivation under SCSP programme



ICAR-KVK, Dharwad in collaboration with ICAR-Central Plantation Crops Research Institute, Kasaragod, Kerala organized training programme on “Advanced cultivation practices in coconut” under SCSP programme on 11.10.2023. Dr. Rajakumar, Scientist (Plant Pathology), ICAR-CPCRI, Kasaragod delivered lecture on coconut cultivation practices and emphasized on pest and disease management as resource person and interacted with the farmers. Dr. Airadevi P. Angadi, Scientist (Horticulture), ICAR-KVK, Dharwad delivered lecture on “Water and nutrient management in coconut”. Dr. M. S. Biradar, Senior Scientist and Head addressed the farmers about multi-cropping system in coconut. About 50 SC farmers and farm women participated in the training. The programme ended with coconut (Hy. West Coast Tall) seedling distribution to all the SC beneficiaries.

### Swachhta Abhiyan 3.0 Programmes

ICAR-KVK, Dharwad organized Swachhta Abhiyan 3.0 Programme at Shri Prabhudev High School, Honnapur village, Alnavar taluka on 05.10.2023. ICAR-KVK, Dharwad Scientists provided awareness about plastic hazards on human and livestock and cleaned the school premises. About 62 students and Teachers of the school along with KVK staff joined their hands for making Swachhta Abhiyan a successful Programme.

### Off campus training on papaya cultivation



### Follow-up field visit to OFT in Okra



### Innovation of Honey Bee Vacuum Machine



### Shri Veeresh Dharwad

Near KUD, Dharwad, Cell: 8050703605

Shri Veeresh invented Honey Bee Vacuum Machine which works same as vacuum cleaning machine. It runs through 12 volt battery or two wheeler vehicles battery where power source is not available. It sucks angry bees and holds in a container. Which makes our work easy to trap. The machine is small in size and holds more than 6000 bees. He has undergone 7 days Scientific bee keeping training from ICAR-KVK, Dharwad and became master trainer with his own interest. Shri Veeresh Dharwad is supplying colony, honey and became expert in queen grafting





## ICAR-KVK ERNAKULAM

### Released compilation on technologies disseminated during 2011-23

The compilation of Ernakulam KVK entitled ICAR-Krishi Vigyan Kendra (Ernakulam), CMFRI: Technologies disseminated during 2011-2023-A compilation illustrated through Newspaper clippings was released by Dr.Himanshu Pathak, Secretary, Dept. of Agricultural Research and Education (DARE) & Director General, Indian Council of Agricultural Research (ICAR) at Ernakulam on 11<sup>th</sup> October 2023. This is a compilation of all the technologies disseminated in Ernakulam district by the KVK during the period 2011-23. The impacts of technologies are also summarized. The compilation is illustrated through Newspaper clippings as this KVK has been using News papers as major extension tool towards disseminating various technologies to larger masses as News papers have considerable impact among common man in Ernakulam district. This district is the first fully literate district in the country declared way back in 1990.



### National level Farmer-Scientist interface organized

The KVK-Ernakulam in association with KVKs Lakshadweep, Kasaragod, Kannur, Kozhikkode, Thrissur, Kottayam, Alappuzha and Pathanamthitta organized a National level Farmer-Scientist interface on 12<sup>th</sup> October 2023 at hotel Le-Meridian, Kochi as part of XVI Agricultural Science Congress hosted by ICAR-Central Marine Fisheries Research Institute (CMFRI), Kochi. Total 178 farmers including 5 Padmashri awardee farmers from Chattisgarh, Goa, Gujrat, Karnataka, Kerala, Lakshadweep, Madhya Pradesh, Maharashtra, Meghalaya, Mizoram, Nagaland, Odisha, Tamil Nadu, Telangana, Tripura, Uttarakhand and Uttar Pradesh participated. The programme was chaired by Dr Ashok Kumar Singh, Vice Chancellor, Rani Lakshmi bhai Central Agricultural University, Jhansi and co-chaired by Dr V. Geethalakshmi, Vice Chancellor, Tamil Nadu Agricultural University, Coimbatore. PadmaShri Cheruvayal K Raman from Kerala, PadmaShri Sabarmatee from Odisha, PadmaShri Chandrasekhar Singh from Uttar Pradesh, PadmaShri Batakrushna Sahoo from Odisha and PadmaShri Seth Pal Singh from Uttar Pradesh participated and shared their success stories. Farmers raised various issues including fair pricing and reliable market for farm produce, formulation of developmental policies by considering needs and challenges of small and medium scale farmers, ensuring social dignity to farmers particularly when approaching financial institutions and government offices, provision of interest free loans to FPOs, inclusion of farmers' produce in public distribution system to enhance market reach, etc. Crisis faced by coconut farmers due to falling prices and disease outbreak was also highlighted.



### Innovation of Nutmeg Decorticator



**Sri. Sachidhanandan Vellyiyath**

South Aduvassery Dist. Ernakulam Cell: 9526323795





## ICAR-KVK GADAG

### Training On Coconut Cultivation And Distribution Of Coconut Seedlings To Sc Farmers

ICAR-Central Plantation Crop Research Institute, Kasargod, Kerala state and ICAR-K.H.Patil Krishi Vigyan Kendra, Gadag jointly organised a training programme on Coconut cultivation and pest & disease management followed by supply of coconut seedlings to the SC farmers on 10-10-2023 at KVK Campus. Dr.Rajkumar, Scientist (Plant Protection), ICAR- CPCRI, Kasargod, Kerala inaugurated the programme. He briefly explained about mandates and activities of ICAR-CPCRI, Kasargod. During technical session he elaborated good agricultural practices that need to be followed in coconut cultivation. He also enlightened the farmers regarding varieties, nutrient management, pest and disease management, value addition of coconut and other technologies developed by CPCRI, Kasargod. 5000 seedlings were supplied to 200 SC farmers belonging to five villages of the Gadag District. Later, Scientist from CPCRI made visit to KVK coconut demonstration blocks, where Kalpa Surya and Kalpa Jyoti varieties of CPCRI are planted. Dr.Sudha Mankani, Senior Scientist and Head (i/c) urged farmers to take up immediate planting of 5000 coconut seedlings provided for the income security of the SC families. Mr.N.H.Bhandi SMS (Soil Science), Mrs.Hemavati.R.H. SMS (Horticulture) and Mr. Suresh L. Halemani (Farm manager) facilitated the programme. The Coconut seedlings were provided to 200 SC farmers.

**Smt. Hemavati R.H., SMS (Horticulture), ICAR-KVK, Gadag**



Innovator's  
Corner



### Innovation of Engine Operated Three Row Weeder with Multi Tool Attachment



**Sri. Raju S. Mannur**

**Hombal Village Dist. Gadag Cell: 9986231353**

Shri Raju S Mannur, resident of Hombal village in Gadag block is a diploma graduate and young progressive farmer. He identified the mechanization gap in weeding and interculture operations in field crops. In order to reduce the cost of labour involved in manual weeding and to ensure timely operation, Mr. Raju conceptualized a 2 stroke petrol engine operated three row weeder which can be operated by the farmers. He then fabricated the weeder in his own workshop and tested the machine in his farm. The weeder worked satisfactorily and attracted many farmers attention. Recognising the need, he started bulk producing the weeder and started selling it in collaboration with a local agricultural machinery entrepreneur. Till date he has sold 15 machines and still receiving the orders. The weeder not only helped small farmers to tackle the labour scarcity issue but also provided an additional source of income by custom hiring service.

Weeder





## ICAR-KVK HASSAN

### Krishi Sakhi Training Programme

ICAR-KVK, Hassan organized the six days training programme on “Agro Ecological Practices” for Community Resource Persons (Krishi Sakhi) of Farm Livelihood Training programme in collaboration with SANJEEVINI- Karnataka State Rural Livelihood Promotion Society and Department of Skill Development, Entrepreneurship and Livelihood, Government of Karnataka at KVK Hassan from 11-09-2023 to 17-09-2023. The inaugural function of this training programme has conducted on 11-09-2023.

Mr. Kishore Kumar, District Manager, NRLM, Zilla Panchayath, Hassan has inaugurated the programme and in his inaugural speech he said that participants of this programme should transfer the technology in effective manner, kirshi sakhi's should encourage integrated farming systems in the farmers field and help them to achieve sustainability in their income. He also mentioned the objectives, motto, roles and aims of SANJEEVINI and Kirishi sakhi's.

Dr. Rajegowda, senior scientist and head, KVK, Hassan has chaired the programme and during his presidential remarks he said that trainees should understand the importance of climate change before transfer the technology to the end users and also encourage group marketing rather than individual marketing of products because it will fetch more profit to the farmers.

Mrs. Veena, District Manager, NRLM, Zilla Panchayath, Hassan has made introductory remarks. 29 participants and Dr. M. Shivashankar, Dr.Nagaraja, T., Dr. Srinivas Deshpande, Dr. Arunkumar, Dr. Pallavi, N., Scientists, KVK, Hassan and Dr. Sakamma, S., Farm manger, KVK, Hassan were also present in the programme. The programme was anchored by Dr. Sanketh, C. V. Scientist (Agricultural Extension),KVK, Hassan has coordinated the programme.



Innovator's  
Corner



### Innovation of Solar & Battery Operated Sprayer



**Sri. Praveen Kumar S/o. Venkatesh, T. S.**  
Thogaranahalli, Alur taluk, Cell: 8050800928

Sprayer is having following parts/parameters

- \* Battery-12 V, 9 Ah and 20 watts capacity
- \* Motar-Double Sprayer Motor 220 psi, 9 liter/min discharge capacity
- \* Inlet pipe- used drop pipe
- \* Outlet pipe-33 feet
- \* Sprayer gun
- \* Spray solution tank Capacity-Depends on requirement
- \* Batter charging time-5 to 6 hour
- \* Area coverage-2.30 to 3.00 hour/ha.
- \* Manufacturing cost-2000/sprayer

Sprayer is battery operated and this battery will charge using solar panel and then this battery will fit into double motor (220 psi capacity) and then this motor will discharge spray solution using battery (12 V, 9 Ah and 20 watts capacity).





## ICAR-KVK HAVERI

### Animal Health Camp

ICAR-KrishiVigyan Kendra, Haveri (Hanumanamatti) conducted an Animal Health Camp on 09.10.2023 at Aladakatti village of Ranibennur tq in collaboration with Department of Animal Husbandry and Veterinary Services. Dr. Mahesh Kadagi, Scientist (Animal Science) involved in organization of event and inaugurated by Dr. Guruprasad. G.S, Senior Scientist and Head, KVK Haveri and Dr. Nelakant Angadi, Assistant Director, Department of Animal Husbandry and Veterinary Services, Ranibennur presided as chief guest.

The programme was witnessed with 135 dairy cattle, 25 buffaloes, 35 bullocks and 45 sheep and goats for various treatment and aided by a team of veterinary doctors namely Dr. Mahesh Kadagi, Dr Balaji and Mr Ravi, livestock inspector. These animals were mainly treated for Repeat breeding, Mastitis, Worm load and tick infestations. Further Mineral mixture was provided to each farmer to mitigate nutrient deficiency.

The farming community also benefitted with improved cultivation technologies for higher fodder yield and to provide sustainable feed to milking animals throughout year. Meanwhile farmers were also narrated with clean milk production and integrated health management of animals. Totally 80 farmers were participated in the Camp.



Innovator's  
Corner



Innovation of

**Gir cow dairy farming and milk marketing in branded reusable bottle**



**Smt. Sahana Honnatti**

Meduru Tq. Ranebennuru, Cell: 9000498252

Mrs Sahana and her husband Mr Harshwardhan purchased Gir cows from different parts of Gujarath state. Initial days' selling of milk was very difficult. Then started branding their product as 'Jevakosha'. They contacted the customers and started home delivery of milk to their door steps in a reusable and returnable glass bottle. Branding label and glass bottle made very attractive and hygienic. Glass bottle reduced the plastic usage for milk delivery. Initially they sold at the price of Rs 60 /Lit. Now they are charge Rs.100/Lit





## ICAR-KVK IDUKKI

### Interstate Exposure Visit Cum Capacity Building Programmes

ICAR-KVK(BSS), Idukki from 1995 onwards works for the empowerment of farming community in Idukki district. To widen up the group dynamics among the farmers a mass range awareness training, campaigns and meetings were organized. As a part of this, organization of an Interstate exposure visit cum Training and also visit to other state to studying marketing strategies, visit to best FPO, identifying potential buyers in collaboration with Agriculture and farmer's welfare department, Government of Tamilnadu in the scheme of Submission on Agricultural extension (SAME)and Extension reforms scheme (SSEPERS), ATMA and ICAR-KVK, Idukki, Kerala was jointly conducted at ICAR – KVK, Seminar Hall, Santhanpara, Idukki, Kerala.

The meeting was started with silent prayer. Dr. S Jayababu, SMS (Animal Science), ICAR-KVK, Idukki welcome the gathering, Mr Sudhakar Soundarajan, SMS (Plant Protection) delivered presidential address. He commented the importance of this programme and conveyed the good performance of farming communities message to all those who are all attended the event and specifically mentioned the potential buyers and sellers from both the side of farming communities. Mr Sudhakar Soundarajan SMS (Plant Protection) delivered sessions on cardamom and other crops cultivation as well as importance of establishment of FPOs. Dr. S Jayababu, SMS (Animal husbandry), ICAR-KVK, Santhanpara overall arrange the programme and delivered awareness on Profitable Dairy farming and Livestock management and Ethno veterinary medicines treatment aspect in dairy cattle and poultry. Mr. Anbalagan, BTM and Mr Saravanan, ATM, ATMA, Department of Agriculture, Thuraiyur, Tiricharapalli assisted the farmers from Tamil Nadu. The programme ended with Vote of thanks by Smt Rachel Skaria, Programme Assistant (Rural craft) ICAR-KVK, Idukki ICAR-KVK, Santhanpara. Around 20 farmer and farmwomen were participated the programme.



Innovators  
Corner



## Innovation of Multiroot system in Nutmeg



**Sri. Gopi C. M**  
Idukki Cell: 9447613755

Spread of the Multiroot system technology is found across all parts of Kerala, nation and worldwide. Demand for the purchase of saplings of nutmeg, cocoa and other crops are received from almost all parts of the world. The architecture of a multi root system may influence its ability to withstand uprooting by wind. It gives better root anchorage that enables the trees to resist strong winds and other adverse conditions. Kerala in the past few years have seen extreme climate vagaries including heavy winds, and flooding. Therefore, nutmeg farmers all over Kerala have showed greater adoption rate as the multiroot system has broad soil adaptability, rapid initial development, drought resistance, early bearing, and high productivity. Moreover, the traits of disease resistance and lower incidence of wilt increases its acceptance among farmers. This innovative technology has achieved an adoption rate of 85% in Kerala and more than 20% all over the World. On an average, these nutmegs are longer, oval shaped, about 5 cm long and 6.5 cm wide, weighing 13-15 gm dried. The multi root system greatly accelerate the growth of nutmeg trees twice as large as the normal trees. So, the trees fruit earlier and bear more fruit compared to the normal trees. This enables the farmers to attain better yields and also better prices at local as well as export market. This technology has positively changed the standard of living of nutmeg farmers in the state. Another remarkable achievement of this technology is reflected in the increasing number of young farmers expressing interest in Nutmeg farming.





## ICAR-KVK KALABURAGI - I

### Agriculture minister Inaugurate 'Connect KVK, Kalaburagi' digital platform and 'Do Scan and Call Scientist' innovative program

Sri. N. Chalavarayaswamy, State Agriculture minister, Govt. Of Karnataka visited ICAR-KVK, Kalaburagi-I and inaugurated QR code scan based 'Connect KVK, Kalaburagi' digital platform and 'Do Scan and Call Scientist' innovative program on 03.10.2023 which consists more than 350 QR code generated technologies video these are farmer friendly and easily transfer of the technology to the farmers widely within a short period. Also he appreciated KVKs different activities for uplifting of the farming community and visited demo units like organic products unit, poultry, rabbit rearing unit, fishery, compost, vermi compost, watershed model, medicinal and aromatic plants model, etc. and interacted with the progressive farmers and Agri entrepreneur's stall like millets, innovative equipment's, organic products, nursery, private company products, bank services, women SHGs products also College of Agriculture, Kalaburagi B.Sc. (Agri.) students displayed various technologies posters, models, demos and homemade products which are exhibited in campus. Later he interacted with the staff, farmers and suggested for further improvement for the welfare of the farming community.

In this program Sri. Allamprabhu Patil, Kalaburagi South MLA, Sri. B. R. Patil, Aland MLA, Dr. M. Hanumanthappa, Hon'ble Vice Chancellor, Dr. S. B. Goudappa, Directorate of Extension, UAS, Raichur, Sri. Mallikarjun D. Hon'ble Board Member, UAS, Raichur, Dr. Sidramappa Patil Dhangapur, President, District Krishik Samaj, Kalaburagi, Sri G.T. Putra, Director, Sri. VenkataramReddy, Joint Director, KSDA, Bengaluru, Dr. M. M. Dhanoji, Dean, College of Agriculture, Kalaburagi and Dr. B. M. Dodamani, Associate Director of Research, Zonal Agricultural Research Station, Kalaburagi and Dr. Raju G. Teggeelli, Senior Scientist and Head, ICAR, KVK, Kalaburagi, Scientists, teaching & non-teaching staff, farm labours and farmers were participated.



### Innovation of Solar Light for Orchard



**Sri. Sharanabasappa B. Patil**  
At: Hal Sultanpur, Tq & Dist. Kalaburagi  
Cell: 9900438541

Solar battery Storage ensures continues power supply by maximizing energy self-consumption even when the sun is not shining.

Solar lights with 7.5mah battery 10 watts solar panel once charged it will lightened up to 3:50 to 4:00 hrs. its cost is Rs. 3500/- per piece for more information contact the farmer





## Director, ATARI visited ICAR-Krishi Vigyan Kendra, Kalaburagi-I

Dr. V. Venkatasubramanian Director, ICAR ATARI, Zone XI, Bengaluru visited ICAR-KVK, Kalaburagi-I on 12.10.2023 for monitoring the activities of KVK due to Union Minister of State for Agriculture and Farmers Welfare Shri. Shobha Karandlaje at ICAR, KVK, Kawadimatti, Tq. Shorapur Dist. Yadagiri on 13.10.2023. He appreciated different activities which are initiated by KVK especially QR code scan based 'Connect KVK, Kalaburagi' digital platform and 'Do Scan and Call Scientist' innovative program for effective transfer of technologies to the wide range of farming community within a shorter period & Director ATARI interacted with the staff and suggested that conduct special programme on millet based seed production & processing activities etc., later scanned the various QR code based technology and appreciate and said definitely propose to adopt this farmer smart technology in All KVKs.

In this program Kalaburagi Dr. S. B. Goudappa, Directorate of Extension, UAS, Raichur, Dr. M. M. Dhanoji, Dean, College of Agriculture, Kalaburagi and Dr. B. M. Dodamani, Associate Director of Research, Zonal Agricultural Research Station, Kalaburagi and Dr. Raju G. Teggeelli, Senior Scientist and Head, ICAR, KVK, Kalaburagi, Scientists, non-teaching staff and farmers were participated.



## Training Programme on Organic farming

ICAR-Krishi Vigyan Kendra, Kalaburagi-I in association with Sri Dharmasthala Manjunatheswra, NGO, Shahapur Tq. Dist. Yadagiri organised One day training programme on Agriculture and Agril. Employments to the farm women of Yadagiri district on 05.10.2023. During the programme, Dr. Shreenivas, B. V Scientist (Soil Science) explained about the KVK mandated activities, facilities and services available at the KVK. Further, he discussed about importance of soil and water testing in Agriculture and nutrient management in pulses. Dr. Zaheer Ahamed, Scientist (Pathology) interacted with participants on integrated disease management in field and horticulture crops. Dr. Yusufali Nimbaragi, Scientist (Agronomy) provided information about integrated crop management in rainfed areas.





## ICAR-KVK KALABURAGI - II

### Millet Field day and Rabi Seed day

On the eve of International Year of Millet 2023, Millet Field day and Rabi Seed day was held at ICAR-KVK, Kalaburgi-II (Raddewadgi) on 06.10.2023. The program was inaugurated by the guest dignitaries and school children by watering the plants. The program was chaired by Dr. Anusuya, Deputy Director, Department of Agriculture, Kalaburagi-2 presided over and the chief guest was Dr. B M Doddamani, Associate Director of Research, ZARS, Kalaburagi and progressive farmers Sri. Somanatha Reddy Poorma and Sri. Subhas Patil participated. Introductory speech of the program was by Dr. N. Manjunath, Sr. Scientist & Head, ICAR-KVK, Kalaburagi-II in his speech he elaborated about the importance of millet crops and the current crop problems and its management measures.

Sri. Somanatha Reddy Poorma, in his experiential words he expressed that, farmers should show their interest towards millets from their intuition and Mr. Subhas Patil shared the experience of growing millets in large area and its usages. And also expressed importance of timely information about crops and its situation accordingly from the scientists of Krishi Vigyan Kendra. Dr. B M Doddamani, Associate Director of Research, said about the program that, farmers should practice seed treatment and aware about seasonal oriented crops and its suitable varieties to mitigate the climate oriented crop problems.

Later, Dr. Anusuya, Deputy Director, in her presidential remarks, young farmers should be self-reliant in seed production, adoption of technologies under climatic extremes and the importance of nutrients in millets. The whole program was anchored by Dr. Chethan. T. and vote of thanks was delivered by Mr. Sanjeevakumar Patil.

After the program, the dignitaries, farmers and school children witnessed the field day by visiting demonstration fields of millets and seed production plots. Farmers from neighboring villages of Jewargi taluk and the staff of ICAR-KVK, Kalaburagi-II (Raddewadgi) were participated in this programme.



### Innovation of Innovative Stall Feeding Unit At Lower Cost (30 X 20 Feet) For Sheep/ Goat



**Sri. Parashuram S/o Ningappa Bommanalli**  
Kallahangarga Tq. Jewargi, Cell : 9916012022

- \* Low cost and durable
- \* Sufficient aeration and sunlight helps to increase body mass index
- \* Availability of feed to all animals uniformly
- \* Easy replacement of structural materials
- \* There is scope for animals to expose their body to sunlight and if rains, animals can take shelter below roofing.
- \* Easily collection of fecal matter. That can be utilized for composting.
- \* With this unit farmers can earn about Rs. 60,000/- within six months by 15 sheeps/goats





## ICAR-KVK KANNUR

### Ragi Field Day

Field day was conducted in association with harvesting of demonstration plots of ragi varieties of Sri. Kurien T., Josegiri, Cherupuzha, Kannur. FLD was conducted to demonstrate high yielding ragi variety KMR 301 in hilly areas of Kannur. Ragi varieties KMR-301 and KMR-630 was given to farmer to assess the performance in the field. Farmer noticed that plant height was more for KMR-301 as compared to KMR-630. Due to heavy rain lodging occurred to both varieties. Farmer expects better performance of the variety KMR-630 in summer season. No. of tillers was more for KMR-301 in comparison with KMR-630 but number of panicles was more for KMR-630. Farmer was satisfied with the performance of both varieties.

Harvesting of the plots was inaugurated by Smt. Anju, Agricultural Officer, Cherupuzha. Observations were taken by Smt. Renisha J. M., Assistant Professor (Horticulture) and Dr. Parvathy A., Assistant Professor (Agricultural Extension) of KVK Kannur.

Innovator's  
Corner



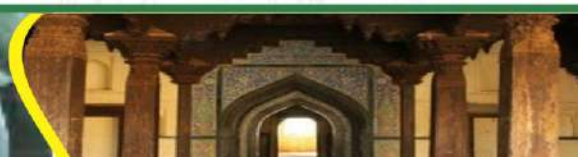
### Innovation of

### Farmer's innovation-GI pipe pepper cultivation



**Sri. Jose Mangathanath**  
Chemberi, Kannur Cell: 8547693372

Mr. Jose Mangathanath from Chemberi (8547693372) is a farmer cultivating 4 acres of grafted black pepper variety Panniyur 1 on live standard of teak, jackfruit, mahogany and *Erithrina spp.* He cultivates the crop by following the scientific management practices and obtains an approximate yield of 1.5 -2 kg dried berries per vine. Near his homestead he has come up with an innovation of cultivating grafted black pepper on GI pipes. The GI pipes of 6 m length are fixed permanently and 2 cuttings per GI pipe were planted at a spacing of 1.5 m. He has allowed the vine to trail on the fixed GI pipes and has placed clips at 2m intervals so that the vine doesn't collapse. He started cultivating grafted pepper vines on GI pipes right from 2018 and still the crop is performing well. This innovation is helpful for the farmers with minimum area for cultivation and installation of such structures will provide an opportunity to cultivate pepper in every homesteads. KVK Kannur noticed this farmer innovation during field visit and is handholding the farmer.





## ICAR-KVK KASARAGOD

### Capacity Building Programme for SC farmers on “Organic vegetable cultivation”

A special training programme on “Organic vegetable cultivation” was organised by KVK Kasaragod at DJ Hall, ICAR-CPCRI on October 11, 2023 under SCSP programme. Dr. Saritha Hedge welcomed the trainees and briefed about the SCSP programme and its benefit to the SC communities of Kasaragod district. Dr. Benjamin Mathew, SMS-Horticulture, ICAR-KVK, Kasaragod, handled the technical session on “Organic vegetable cultivation” and also conducted method demonstrations of different preparations of organic decoctions for pest management. The different bioagents like pseudomonas, trichoderma etc. were explained as part of IPDM in vegetables. IIHR vegetable seed kit consisting of Tomato, Amaranthus, Chillies, Ridge gourd, Bottle gourd, Radish and Palak seeds were also distributed to the participants and explained about the cultivation and management practices. During the afternoon session the trainees visited CPCRI farm and Mr. Anoop Kumar (Technical Assistant, CPCRI) explained the steps in the coconut seedling nursery management. The meeting was concluded with an active interactive session by participating farmers. A total of 25 SC farmers from two Panchayats of Kasaragod district participated in the programme.



### Innovation of VINPEPT - Pepper Thresher



**Sri. Gopala Krishna Sharma**

**Post Padre, Kasaragod, Cell: 09446655218**

A pepper thresher “VINPEPT” was developed by Gopala Krishna Sharma S, Saravu, Perla, Padre post, Kasaragod district, Kerala for threshing the green berries of black pepper from its spikes. The patent application was filed during 2012 and is under process. The machine has a threshing capacity 250 kg of pepper per hour with a threshing efficiency of 99.5 per cent which is very good. Further the berries are not damaged due to threshing, thereby preserving the quality. The machine saves lot of costly manual labour and ensures timely threshing with the quality. A total of 158 machines are sold so far during the last five years which is used by 4000 small and medium farmers on an average in sharing basis. Annually about 12,000 tonnes of green are processed (4000 tonnes of black pepper berries after drying) using this machine. The export of black pepper requires good quality with no human contaminants like hair or sweat which is achieved by this machine. The machines are marketed by RAIDCO Ltd, which is a Govt. of Kerala Undertaking.





## ICAR-KVK KODAGU

### Installation cum demonstration of Arabica coffee pulping machine under Tribal sub plan

ICAR-Krishi Vigyan Kendra Gonikoppal, Kodagu conducted Installation cum Demonstration programme of arabica coffee pulping machine under the tribal sub plan on 9<sup>th</sup> October 2023. Two coffee pulping machines (hand operated and mechanized) were installed at Maldare village and Avaregunda village under SCSP/TSP programme as a part of demonstration cum income generation activity. In the programme, Mr. Prabhakar, Head Incharge, Dr. Suresh, SMS(livestock) KVK, Mr. Dhanukumar, ODP(NGO) and Mr. Mohan Kumar (machine designer) were present. The installation and usage of arabica coffee pulping machine was demonstrated to the selected SCSP farmer (Mr. Muthappa) and TSP farmer (Mr. Chandru) in Maldare cluster. This machine will improve the processing of coffee and get higher price realisation in the market.



### Innovation of Conservator of Piper Adi Black pepper



**Sri. Poonacha, N.N**  
Garwale Village, Suntikoppa Tq. Somwarpet  
Cell: 9448515015

Mr. Poonacha have been identifying, conserving and popularizing the naturally occurring Adi Black pepper in the Western Ghats of Kodagu since two decades. It is having a features of Bold sized berries(6mm), dry recovery(38-42%), tolerant to black rot and anthracnose, adoptive to misty and high rainfall area and fetches premium prices in the domestic and international market.

For his effort and hard work, PPV & FRA, New Delhi registered this variety of black pepper for conservation, development and protects property rights. He has attended various state, national and international seminar and presented the specialty of Adi pepper and given wide publicity among the farming community. ICAR-KVK, Kodagu, University of Agriculture & Horticulture Sciences, Shimogga assisted him in registration of the variety and its popularity.

Bold size corns, handpicked and hygienically processed. Handpicked before ripening and hygienically processed. Handpicked the ripen corns and hygienically processed. Handpicked the ripen corns and squeezed out to get the white pepper and hygienically processed.





## ICAR-KVK KOLAR

### On campus capacity building programme on integrated pests and disease management of important agriculture crops.

KVK, Kolar in association with ATMA, Kolar today organized the on campus capacity building training programme on integrated pests and disease management of important agriculture crops on 5.10.2023 at KVK, Kolar. Smt. Bhavya rani G.R, Deputy Director, Department of Agriculture, Kolar inaugurated the function. Dr. Shivanand V. Hongal, SS&H presided over the function. K. Thulasiram, Assoc. Professor of Entomology, COH, Kolar delivered lecture on integrated pest management of agriculture crops. Dr. Sadanand K. Mushrif, Scientist, (Plant Protection) explained about integrated disease management of agriculture crops. Dr. Anil Kumar, Scientist (Soil Science) delivered a lecture on importance of natural farming in agriculture and Mrs. Swathi G R, SMS (Agromet) delivered the lecture on importance of weather forecasting in agriculture. Around 50 farmers participated and benefited by this programme.



### Swachata abhiyan campaign 3.0

Swachata abhiyan programme was organized at KVK, Kolar. Prime Minister Shri Narendra Modi encourages people to fulfil Mahatma Gandhi's vision of Clean India. The 'Swachh Bharat Abhiyan' is a massive mass movement that seeks to create a Clean India. KVK staff and DAESI students were actively involved in cleaning in and around campus on 4.10.2023.



### Capacity development program on improved production technology of Potato & application of ARC techniques in Potato cultivation.

ICAR-KVK KOLAR in association with department of Horticulture organized Capacity development training program on improved production technology of Potato & application of ARC techniques in Potato cultivation on 10.10.2023 at KVK, Kolar. Dr. Shivanand V. Hongal, Senior Scientist & Head, KVK, Kolar inaugurated the workshop and explained about advances in potato cultivation. Dr. Prasanna H S, Agro advisor, International Potato centre explained about cultivation practices in potato and cultivation of potato through apical rooted cuttings. Dr. Anjaneya Reddy, Assistant Professor, Plant pathology, delivered a lecture on integrated pest and disease management in potato. Around 100 potato growing farmers of Kolar district participated & benefited by the program.





## Animal health camp & a training program on management of cows to achieve - "Calf a year"

ICAR-KVK kolar organized Animal health camp & a training program on management of cows to achieve - "Calf a year" at Dandiganahalli village of kolar taluk under SCSP project on 13.10.2023. Dr. Asha K. M, Scientist (Horticulture) & Dr. Shashidhar K. R, Scientist (Sericulture) presided over the function and created awareness on Animal health and distributed various materials among the farmers. Around 500 animals of which 81 cows, 18 buffaloes, 150 goats, 160 sheep, 76 hens & 15 pet dogs have been brought for vaccination, deworming, infertility & other disease management. Tablets, mineral mixtures, vitamins, liver tonics, etc have been distributed among 80 farmer families to manage the health of their animals. Dr. Ramaiah, Gynecologist & District veterinary officer delivered lecture on management of cows to achieve "Calf a Year". Dr. Vijay patil, Veterinary officer & their hospital staff participated in the camp to treat animals.



## Off campus capacity development programme on improved production technology of Finger millet cultivation

ICAR-KVK Kolar Soil Scientist in association with the department of Agriculture organized Capacity development training program on improved production technology of Finger millet cultivation at RSK Narsapura on 18.10.2023. Dr. Anil Kumar Scientist Soil science explained about improved cultivation of Finger millet crop. Around 35 farmers participated & benefited by the program. Organized Swachata abhiyan programme, Krushi sakki and staff were actively involved in the cleaning the premises.



## Innovation of Cultivation of Mulberry in Tree Method Under Dryland Farming



**Sri. V. Venkataramaiah S/o. Huliappa**  
**Honnenhalli Village Cell: 8123508445**

During 2013-14 practically initiated cultivation of mulberry in tree method for 0.1 ha with spacing of 8 x 8 ft. He prepared pits of 4 x 4 x 4 feet Length x Breadth x Height with the onset of monsoon in 2013 and filled the pits with all sorts of organic matter such as FYM, green biomass, crop residue, silkworm bed waste etc up to 2 feet height to enrich organic matter. Undertaken V-1 variety plantation accommodating 144 plants to cultivate under rain fed conditions. Collected 2 litres of plastic water bottles made small holes and placed near root zone of main stem below the ground level for each tree and fill it with water that brings in tumbler. To improve water table in the garden he also prepared small sized trenches so that water percolates as and when it rains. Watering up to 2 years during rabi and summer season for establishment of tree mulberry garden. Pruned main stem at a height of 4 ft from the ground level after 8 months of planting and maintained tree shape for uniform growth and development of mulberry plant.





## ICAR-KVK KOLLAM

### Capacity building of Seed Capital SHG beneficiaries PMFME scheme:

The Prime Minister Formalization of Micro Food Processing Enterprises (PMFME) scheme is an initiative by the Government of India aimed at promoting micro-enterprises in the food processing sector. The Pradhan Mantri Formalization of Micro Food Processing Enterprises (PMFME) scheme aims to enhance the competitiveness of existing micro-enterprises in the food processing sector and promote formalization of the sector. It encompasses various activities related to the formation and promotion of Self-Help Groups (SHGs) and supporting their capacity building, including seed capital. Seed Capital is one of the key components of the PMFME scheme. It provides financial assistance to Self-Help Group (SHG) beneficiaries to kickstart their food processing businesses. Capacity building is crucial to ensure that these beneficiaries make the most out of the seed capital and run successful enterprises.

RAFTAAR Agri Business Incubator of KAU and ICAR KVK Kollam jointly organized a one-day capacity building programme Seed Capital SHG Beneficiaries – Kollam at ICAR KVK Kollam. There were fourteen participants for the same. The participants were trained in Food Domain: Knowledge Base, Considerations in establishing an enterprise and Marketing, branding, sales, and distribution, Food packaging and labelling, Food safety standards and registration and were also given practical training.



### Innovation of Automatic Cup Hanger Making Machine for Rubber Plantation



**Sri. G S Mohankumar**  
Ayoor, Kollam Cell: 8078393956

A machine for making cup hanger which are used to place cups for collecting rubber latex. The product is made using 2.5 mm GI wire





## ICAR-KVK KOPPAL

### Celebration of Krishi Niratha mahila dinacharane

Women are the back bone of agricultural work force. It was observed that women play a significant and crucial role in agricultural development and allied fields including, main crop production, livestock production, horticulture, post harvesting operation, agro/social, forestry, fishing and many more. ICAR Krishi vigyan kendra, Gangavathi along with ICICI foundation , Ngo Koppal organised “Krishi niratha mahila dinacharne ” in Guttur village Yelburgatalukon 15-10-2023. Dr Kavitha Y Ullikashi Scientist (Home Science) inaugurated the programme and delivered speech on role of women in agriculture and explained different drudgery reducing equipments. She also explained about malnutrition among women in Kalyan Karnataka and its management. Dr.Jyothi.R Scientist (Horticulture) explained about importance of nutrition garden in eradication of malnutrition in vulnerable groups. She also explained about marigold and nursery cultivation as alternate income generating activities for women. small Smt.Meenakshi. Resource person ICICI foundation, Ngo Koppal explained about different government programmes for women. About 45 women were attended the programme.



### SwaUdyog Prerana Shibhira

Self employment provides an opportunity to make the women economically empowered and they are in position to face any challenges in their lives. ICAR KVK Gangavathi along with SKDRP Gangavathi organised programme on swaudyog Prerana shibhira in ICAR KVK Gangavathi on 10.10.2023. The programme was inaugurated by Sri Virupakshmurthy corporation commissioner, Gangavathi. He explained different self-employment programmes for women from government. Sri Balkrishna Programme coordinator SKDRP Gangavathi explained different programmes of SKDRP. Sri Chandrakanth ADA, gangavathi explained different programmes for women in Agriculture department. Dr Raghendra Yaligar Senior scientist and head ICAR KVK Gangavathi explained about different agriculture related income generating activities and organic farming. Dr.Kavitha Y Ullikashi Scientist (Home Science) explained and demonstrated the oyster mushroom cultivation. More than 110 rural women were attended the programme .



### Innovation of Metal Trolley For 2 Wheeler Motor Bike



### Sri Kanakappa Malagavi

Sirwara Tq. Kanakagiri Cell: 9901673712

Shri Kanakappa Malagavi IFS farmer from Sirwara village of Kanakagiri taluk of koppal district made his innovative ideas for easy transportation of agriculture produce of his farm to nearby market. The farmer is having agriculture land area of 4 acres and involved in cultivation of Paddy, Groundnut, Vegetable crops, Sapota, Guava and also Goat farming. The vegetable and fruit crops are cultivated in an area of 0.5 and 0.75 acres respectively. The farmer face difficulty in the transportation of small quantity of fruits and vegetable produce from his farm to market place with the hired vehicle. So, he came out with an innovative idea of attaching metal trolley to his two-wheeler motor bike with trolley capacity of 300 kg (12 boxes of 25 kg). This idea made him to reduce the transportation cost for his farm produce and also helped him to bring critical inputs to his activities.





## ICAR-KVK KOTTAYAM

### Annual Review meeting of NICRA project for 2022-23

The annual review 2022-23 of ICAR project “National Innovations in Climate Resilient Agriculture” funded by CRIDA was organized by Krishi Vigyan Kendra, Kottayam on 13<sup>th</sup> October, 2023. The project is being implemented in 14 KVKs of Karnataka, Kerala and Lakshadweep to promote climate resilient technologies and address climatic vulnerability for enhancing farmers’ income. Dr. DV Srinivasa Reddy, Principal Scientist, ICAR-ATARI, Bengaluru welcomed the gathering. Dr. JVNS Prasad, Principal Investigator of NICRA Technology Demonstration Component, CRIDA Hyderabad presented the achievements of the project in Kerala, Karnataka and Lakshadweep. He stated that integrating technologies at household level helps minimize adverse impacts. Tumkur has been recognized at national level for its achievement under NICRA project.

The workshop was inaugurated by Dr. Trilochan Mohapatra, former Director General of ICAR and the Chairperson of the Protection of Plant Varieties and Farmers’ Rights Authority. He stressed the need for climate resilient technologies and suggested that integrated farming systems including millets and pulses suitable to each agro ecological conditions to be the best model for overcoming climatic challenges and provide livelihood security. He reiterated the need to conserve indigenous varieties that are more stable to climate change and establish seed banks to ensure availability of planting material. He further stated that NICRA was a part of discussion during G20 summit at Banaras. He appreciated the works done by Krishi Vigyan Kendras in dissemination of technologies and supporting farmers in conserving and protecting the native genetic wealth.

Dr. VK Singh, Director, ICAR-CRIDA, Hyderabad in his opening remarks suggested that technologies to address soil salinity, acidity, moisture stress have to be promoted for the farmers to attain resilience to climatic vagaries. Dr. Dinesh Kumar Agarwal, Registrar-General, Protection of Plant Varieties and Farmers’ Rights Authority, Government of India, New Delhi opined that rains often play a chasing game with crop harvest that adversely affects seed production. He suggested that PPVFRA and NICRA can act on a common platform with the participation of KVKs.

The presentations by the fourteen KVKs on their activity during 2022-23 were critically evaluated by the team with modifications and guidelines for future plan of action. All the forty eight KVKs under ATARI Zone XI, Bengaluru attended the programme.



### Innovation of Nutmeg Variety ‘KAU Poothara’



**Sri. T. Joseph**

Vaikaprayar P O, Tq. Udayanapuram, Cell: 9447214244

Shri . T. Joseph is an innovative farmer with remarkable achievements in the field of spice crops in integration with other major crops like coconut and vegetables. He is very closely associated with Kerala Agricultural University and with KVK Kottayam for the last 12 years. His major achievement is the development and release of the nutmeg variety ‘KAU Poothara’ in 2018 in association with Kerala Agricultural University.

Apart from the variety released by KAU, he is also conserving 4 other nutmeg accessions which are superior in quality. Also, two paddy varieties, one each of ginger and pepper varieties and three vegetable varieties were also conserved in his farm at Vaikom.





## Orientation workshop on Protection of Plant Varieties and Farmers Rights

One day workshop for sensitizing farmers and officials of KVKs from Kerala, Karnataka and Lakshdweep on Protection of Plant Varieties and Farmers Rights Act was organized by Kishi Vigyan Kendra, Kottayam on 14<sup>th</sup> October, 2023. Dr. Venkatasubramanian, Director, ATARI, Bengaluru welcomed the gathering after briefing the need to conserve, protect and register the plant genetic resources of the country. Dr. Dinesh Kumar Agarwal, Registrar-General, Protection of Plant Varieties and Farmers Rights Authority, Government of India, New Delhi described the activities of PPVFRA. He proudly stated that out of the 18192 applications received for registration under PPVFRA, 60% are of farmers' varieties. He opined that KVKs can be entrusted with tapping the genetic resources and mapping farmers' varieties in each District and further KVKs or FPOs can facilitate multiplication of seeds. In his address, Dr. V K Singh, Director CRIDA opined that the climatic constraints have great variations in the country. Organic farming has high potential for carbon sequestration and makes the farm climate resilient. In this context, PPVFRA and NICRA have common future goals. Dr. Trilochan Mohapatra, Chairperson, Protection of Plant Varieties and Farmers Rights Authority, Government of India, New Delhi in his keynote address stated that farmers of the country have a unique collection of germplasm that are more stable to the climatic changes. He appreciated the role played by KVKs in protecting the genetic wealth available with the farmers and supporting them for getting it registered. Around twenty selected farmers were honoured for their contribution in conserving, protecting and cultivating indigenous crop varieties. Dr. Jacob John, Director of Extension proposed the vote of thanks and further assured to conduct workshop for scientists and farmers on protection of plant varieties and farmers rights.

Dr. Ravi Prakash, Technical consultant, PPVFRA and Dr. Elsy, C. R. former in-charge of IPR cell of Kerala Agriculture University detailed the PPVFR Act 2001 and elaborated the guidelines for registering farmers varieties. An exhibition on indigenous plant varieties, seeds and planting material, and value added products from Karnataka and Kerala was also arranged. Around thirty farmers and scientists of forty eight KVKs from Karnataka, Kerala and Lakshadweep participated in the programme.





## ICAR-KVK KOZHIKODE

### Special Swachhata Campaign

As a part of Special Swachhata Campaign, Krishi Vigyan Kendra, Kozhikode has organized about eight programmes till 15.10.23. In addition to daily Swachhata programmes to clean the office premises, three awareness programmes on importance of swachhata and bio-waste management, two campaigns for the collection and disposal of plastic waste from the campus, cleaning of water sources like ponds, weeding of old files etc. were organized at the KVK campus. A Swachhata campaign was also conducted at the farmers' field at Maruthomkara for cleaning and removal of wood debris from the field. A total of 91 farmers and 46 staff were attended different programmes.

(Authors/editors: Dr.P.Rathakrishnan, Head, KVK, Mr.C.K.Jayakumar, Technical Officer (PA, Computer), KVK, Kozhikode, Kerala)



### Training programme organized

A one day training was conducted on 5.10.23 at KVK Calicut in collaboration with CWRDM, Calicut under SCSP scheme on Household level production of oyster mushroom and utilization of spent mushroom bed and other kitchen waste for vermicomposting. Hands on training was given to selected youth. The programme was led by Dr.Prakash K.M.,SMS (Agron).



Training programme on Household level production of oyster mushroom and utilization of spent mushroom bed and other kitchen waste

### Technology demonstration component on millets inaugurated

As an activity during International year of Millet and for demonstrating climate resilient crops, a demonstration and field training was organized on land preparation and sowing of Jowar, Bajra and Ragi at Maruthomkara. The programme was inaugurated by K.Sajith, Panchayat President and the programme was led by Dr.P.Rathakrishnan, Head, KVK and Dr.K.M.Prakash (SMS-Agronomy) and Mrs.Anjana K.P(SRF-NICRA).



Technology Demonstration Component On Millets





## ICAR-KVK MALAPPURAM

### Unveiling The Power Of Trichoderma Cake As Bioshield In Coconut

Front line demonstration (FLD) on the application of Trichoderma Cake as a biocontrol agent against Bud Rot, Tanjore Wilt, and Stem Bleeding in coconut trees was conducted for the benefit of farmers in the Melattoor Panchayath. The demonstration aimed to showcase the effectiveness of Trichoderma Cake as a sustainable and eco-friendly solution to combat these prevalent diseases that often lead to significant losses in coconut production. Dr. Najitha Ummer, Assistant professor, educated the coconut farmers about the various diseases affecting coconut trees, including Bud Rot, Tanjore Wilt, and Stem Bleeding and demonstrated the proper application of Trichoderma Cake as a biocontrol measure to prevent and manage these diseases. The positive feedback and interest shown by participating farmers indicate a growing awareness of the benefits of biocontrol methods, and it is recommended that further extension services and training be provided to encourage wider adoption of Trichoderma Cake in coconut cultivation in the region.



### Greening Banana Farms: Substituting Mop With Organo Mineral Potash In Frontline Demonstrations



A front line demonstration was conducted in Melattoor and Tavanur Panchayaths to evaluate the efficacy of Organo Mineral Potash (OMP) as a replacement for Muriate of Potash (MOP) in banana cultivation under the guidance of Dr. Jasna VK, Asst Professor. OMF Kis an economically viable option, potentially providing cost savings for farmers while meeting nutrient demands. The demonstration aimed to assess the impact of OMP on banana growth, yield, and overall soil health while considering economic factors and environmental sustainability. The FLD aims to evaluate the effectiveness of Organo Mineral Potash (OMP) in banana cultivation as a substitute for MOP, to assess the impact of OMP on banana plant growth, fruit quality, and yield, to analyze the economic feasibility of using OMP in comparison to traditional MOP.

Banana farms in Melattoor and Tavanur Panchayaths were chosen for the demonstration, ensuring a representative sample of the area's agricultural practices. OMP was applied to the designated plots following the recommended dosage, while MOP was applied to the control plots in the usual manner.



### Innovation of Movable Panthal



**Sri. Abdu Razak M.**  
Cheetiipady P.O., Cell: 9400511755

**"Movable Panthal":** A movable pergola is a versatile and functional outdoor structure that can provide support for trailing plants and climbers while also offering a comfortable sitting arrangement. This type of pergola is designed to be portable or easily movable, allowing you to change its location or reposition it as needed.





### Demonstration of Silage Making In Jumbo Bags

Silage making is the most effective method for conservation of fresh green fodder during the periods of surplus availability for usage at scarce periods. Grass at the stage of maximum nutrient availability is stored anaerobically in facilities such as pits, tanks, drums and so on. Availability of suitable facilities for ensiling forms the usual constraint for small scale dairy farmers. Accordingly ensiling of grasses / agricultural byproducts using large bags was demonstrated by the KVK in the Farmers' premises. Jumbo silage bags of around one ton capacity are being filled with grass either chopped using chaff cutter, or as intact uncut fodder, with intermittent pressing and layering with Maize flour or Jaggery. The tightly filled bags are sealed air tight and kept at least for 2 months and stored intact for later usage when the necessity arises.



### Training programme on "Importance and cultivation practices of Millets"

KVK Malappuram organized one day training programme on "Importance and Cultivation Practices of Millets". The training was attended by NSS students of GVHSS, Kadanchery on 11th October 2023. The primary aim of this training was to create awareness about the International Year of Millets and emphasize the importance of millets in our daily lives. The training began with expert lecture by Smt. Sruthy K T (SMS, Agronomy). The lecture highlighted the significance of millets in promoting food security, nutrition, sustainable agriculture and valuable insights into the nutritional value and cultivation of major millets like Ragi, Bajra, Sorghum, Barnyard millet, Proso millet, Kodo millet and Little millet. A practical session allowed students to observe various types of millets maintaining in the Farm of KVK and enabled them to understand the millet cultivation techniques. The training fostered a sense of responsibility towards promoting millet cultivation and consumption for a healthier and more sustainable future.

### Capacity building programme on "Cassava Processing & Value Addition"

KVK Malappuram conducted a hands-on session on "Cassava processing and value addition" for the benefit of 15 SC (Scheduled Caste) beneficiaries in Kerala as part of a training program sponsored by KSCSTE-CWRDM and Department of Science and Technology on 30th September 2023. Dr. Priya G. Nair, Programme co-ordinator inaugurated the programme and Dr. Sarath Jith, Scientist CWRDM delivered the felicitation address. Cassava is a versatile crop that can be used to create various value-added products. Value added products like chips, hot mixture, spicy crisps, sweet fries, ribbon pakkavada, Murukku, cutlet etc. were prepared from Cassava under the supervision of Dr. Lilia Baby, Assistant Professor (Community Science). This kind of training sessions are essential for disseminating knowledge and enhancing the skills of beneficiaries, ultimately contributing to the upliftment of rural communities and the promotion of sustainable agriculture practices.





## ICAR-KVK MANDYA

### "Krishi sakhi programme"

SANJEEVINI- Karnataka State Rural Livelihood Promotion Society Department of Skill Development, Entrepreneurship and Livelihood, GoK in collaboration with University of Agricultural Sciences, Bangalore. The ICAR-KVK Mandya has organized training programme on Agro-ecological practices for community resource persons (30 Krishi sakhi) from 02.10.2023 to 07.10.2023. Objective of this training is to develop and prepare the Krishi sakhi as a progressive farm women and also community resource persons in their Gram Panchayath. It's a platform for Krishi sakhis to enrich their agricultural knowledge and know about facilities and schemes regarding agriculture sector. Dr. Raveendra, Deputy Project Director, Zilla Panchayath, Mandya enlightened the government support for the capacity building of farm women and also train them to serve as a community resource persons in their locality.

Dr. Naresh, N.T, Senior Scientist and Head, wished Krishi Saki's to enrich their agriculture knowledge and also make use of that while serving as community resource persons.

Dr. Suresh, D.K, Project Coordinator explained the idea behind the conceptualization of Krishi Sakhi training programme in better use of local resource to diffuse farm technologies from lab to land effectively and other Scientists of the KVK, V.C.Farm, Mandya were participated in the programme.



Innovator's  
Corner



Innovation of

## KANASU

Natural Foods



**Sri. Niranjan.H.S.,**

Honnanayakahalli Dist. Mandya Cell : 8073484942

Brand 'KANASU' – The farmer as grown different species of crops in his farm and value addition for the same is done such as moringa leaf powder, curry leaf powder, turmeric flakes and powder and lemon pickle which he markets them in the brand name 'KANASU'.

The idols of Ganesha and Gowri, Flower pots and the lamps are being prepared from the cow dung and marketed throughout Karnataka and other States under the brand 'KANASU'. The farmers has unique quality which he has headed a step forward by conserving the desi cow breeds and has become an example for other flourishing youth farmers in the Mandya District.





## ICAR-KVK MYSURU

### Celebration of "World food day" by ICAR JSS KVK Mysuru

ICAR JSS KVK Mysuru in collaboration with Organic Farming Research Station (OFRS) Naganahalli Mysuru, Akashavani Mysuru and IAT chapter Mysuru jointly organized "World food day" celebration at Organic Farming Research Station (OFRS) Naganahalli Mysuru on 16th October 2023. Retired agronomy professor Dr. Nagaraju briefed about improved method of cultivation in paddy using less water. Organic Farming Research Station (OFRS) Naganahalli Head Dr. Ramachandra coordinated visit of participants to demo units of Organic Farming Research Station. Shri Keshvamurthy from Akashavani Mysuru highlighted importance of green revolution in India.



### Training on Scientific cultivation practices on Butter fruit and Dragon fruit

ICAR JSS KVK Suttur, Mysuru conducted on campus training programme on Scientific cultivation practices on Butter fruit and dragon fruit on 7<sup>th</sup> October, during the programme Dr Muralidhar B M, scientist horticulture from ICAR IIHR CHES, Chettahalli delivered lecture on varietal selection, nutrient management, water management, training and pruning, integrated pest and disease mangment in both Butter fruit and dragon fruit crops. In this programme more than 100 farmers participated and got benifitted from Mysuru and Chamarajnar districts.



You Cannot Understand the value of food until you have stayed hungry



**Sri Dileep C**

Jayapura Tq. Mysuru Cell: 8618798131

### Innovation of Pnuematic Milk Bottle Washer



Dileep C is an innovative farmer hails from Gopalpura Village, Jayapura Hoobli, Mysuru Taluk and District. Young farmer is aged about 40 years and has pursued diploma in fine arts. He has around 2.18 acres of land where in he has planted Coconut trees – 180 Nos. Teak – 120 Nos., Areca nut – 700 Nos., Coffee – 1050 Nos., Sandalwood – 450 Nos., and 55 varieties of Exotic Fruit plants. Along with horticulture crops farmer is practicing dairy farming. He possesses 5 Gir Cows, 2 Hallikar Cows, 3 Jersey Cows, 1 Gir Bull and 60 backyard chickens. Fodder crops such as African Tall Maize, Hybrid Napier, COFS-31, Sesbania, Drum stick are grown. He has adopted dry fodder enrichment, silage and azolla production technologies. Daily he is supplying around 60 litres of Milk to Mysuru Citizens at Rs.120/ltr in glass bottles. Milk byproducts

such as butter, ghee, khoa and paneer are produced. This innovative farmer has developed a **Pnuematic Milk Bottle Washer** for easy cleaning of milk glass bottles at very low cost in comparison to market. For efficient utilization of cow dung, Flexi bio gas plant is installed at his farm. Slurry produced is used for agriculture and vermicompost production. Many of the farmers, SHG's, NGO's, and the Line Department Officers from State and District level regularly visit his Kalpatharu Dairy farm.





## ICAR-KVK PALAKKAD

### Professor P.R Pisharadi Commemoration Agricultural Seminar

The KVK Palakkad, the Department of Agricultural Meteorology, College of Agriculture, Vellanikkara, and Kollangode gramapanchayath, jointly organized a commemorative seminar in the birth town of Professor P.R. Pisharody, renowned as the father of remote sensing, in Kollangode, Palakkad District. The seminar was held at Ashrayam College of arts and science, Kollangode and focused on the vital theme of climate change and agriculture. The seminar was presided over by Dr. Sumiya K.V, Programme coordinator, KVK Palakkad and was inaugurated by Member of the Legislative Assembly (MLA) K. Babu, who shed light on the significance of addressing climate change impacts on agriculture. The topics covered during the seminar encompassed a broad spectrum of issues related to climate change, its impact on agriculture, weather forecasting, innovative agricultural practices, farm tourism and the integration of remote sensing and technology in agriculture. The discussions emphasized the importance of adopting sustainable farming practices to mitigate the adverse effects of climate change on agricultural productivity. An exhibition of agro meteorology instruments, climate change and its effects was also organized along with the seminar. A session on farmer scientist interface was also conducted. The seminar witnessed enthusiastic participation from the farming community, agricultural faculties and agricultural students, who actively engaged in discussions, seeking clarification on various topics.

**Dr. Reshmi J, Assistant professor, KVK Palakkad.**



### Inauguration of Front Line Demonstration of Demonstration of Improved Weight gain in Attappadi Black kids by Supplementing Kid Starter



As part of FLD 2023-24 of KVK Palakkad, the FLD on demonstration of improved weight gain in Attappadi black kids by supplementing kid starter was inaugurated at Attappady of Palakkad district on 10/10/2023. All the beneficiaries of the programme were scheduled tribes. All the beneficiaries were given kid starter for their kids for three months at the rate of 100gm per day for third month of age, 150gm per day for fourth month of age and 200gm per day for fifth month of age. Dewormer was also advised to be given to the kids prior to the feed.



### Innovation of Coconut Cutting Machine



**Sri Venugopal K**  
Vannamada (P.O.) Tq. Chittur Cell: 9400679210

Venugopal, a farmer from Kozhinjampara village in Palakkad district, Kerala, has invented a coconut cutting machine that can break 750 nuts per hour. Venugopalan came up with the idea for the machine after confronting the difficulties in breaking nuts. The traditional method of breaking coconut is a time-consuming process. Venugopalan's machine simplifies the process, making it safer and more efficient. The machine helps to reduce the cost of coconut processing, avoids the need for dehusking process and it can also help to improve the quality of coconut products.





## ICAR-KVK PATHANAMTHITTA

### SWACHHATA HI SEWA CAMPAIGN

As part of the Swachhata Hi Sewa Campaign, ICAR-Krishi Vigyan Kendra, Pathanamthitta organised Cleanliness Drive in which officials, project staff and KVK farm workers participated enthusiastically and appealed to contribute in building a garbage free India. On 2<sup>nd</sup> October 2023 *Swachhta pledge* was taken by all the participants and the certificates were issued. The programme was inaugurated by Dr. C.P Robert, Senior Scientist and Head, ICAR-Krishi Vigyan Kendra, Pathanamthitta. As part of the campaign cleanliness of office premises and KVK farm was carried out. Other programmes included cleaning of vermicompost demonstration unit, weeding out office scraps and cleaning of weeds in Mango orchards in KVK farm. On 4<sup>th</sup> Oct 2023 an *awareness programme* was also conducted at State Bank of India (SBI), Kumbanad, NRI branch. On the occasion quality tree saplings and vegetable seeds were distributed to the Bank Officials and the customers. The Swachhta Hi Sewa campaign was attended by a total of 161 participants.



*I call myself a labourer because I take pride in calling myself a spinner, weaver, farmer and scavenger*

M.K. Gandhi



Innovation of

**Black Soldier Fly (BSF) Larvae Farming**



**Sri. Arun Jacob**

Cherukkatu, Kurianoor PO, Koipuram

Poultry farming is wavering on the brink of collapse due to high feed cost. The need of the hour is to find alternate sources of feed for poultry birds. One such replicable initiative is the Black Soldier Fly Larvae production from hotel food wastes. This reduces not only the feed cost but also helps in waste management.





## ICAR-KVK RAICHUR

### Integrated Crop Management Training Programme on Cotton

All India Coordinated Research Project (AICRP), on Cotton, Main Agriculture Research Station, Raichur in collaboration with ICAR-Krishi Vigyan Kendra, Raichur organization one day training programme “Integrated Crop Management in Bt-Cotton” on 4<sup>th</sup> of October 2023, under Tribal sub project programme the ICM based training programme on Bt-Cotton was inaugurated by Dr. Ashok Hugar, Associate Director Research, Main Agriculture Research Station, UAS, Raichur by watering the plant. During inaugural addresses, ADR called upon the farmersto keep in touch with scientists in order to increase the yield since overuse keeps yield of this region is lower than national average. Dr. Ajaykumar, Senior Scientist (Agronomy), AICRP, Cotton, MARS, Raichur gave useful speech on agronomic practices to enhance yield of Bt-cotton. Dr. S.N. Bhat, Senior Scientist and Head, ICAR-KVK, Raichur gave the information pertaining to some measures poor the soil healthy and yield s..... since the farmers are using the fertilizers in an imbalance form. Dr. S.G. Hanchinal, Senior Scientist (Entomology), AICRP, Cotton, MARS, Raichur address the farmers to go for integrated pest management to manage pink boll warm affect and to reduce insecticide residence. The programme was anchored by Dr. Shreevani, G.N. Scientist (Entomology), ICAR-KVK, Raichur. The benefit of this programme was taken by 20 ST farmers of Jakkaladinni and Tippaladinni village of raichur district and finally inputs provision were to these farmers



### Innovation of

1. Drip laterals rolling machine
2. Bullock drawn chemical fertilizer drilling machine



**Sri. Amaresh Sharanappa Kote**  
Jakkaladinni, Tq. Manvi Dist. Raichur  
Cell: 8861233616

### Bullock drawn chemical fertilizer drilling machine

Incrops which needs chemical drilling where there is a problem of root grubs (especially in chilli, groundnut even in sorghum crops etc.) soil application of phorate or carbofuron chemicals are recommended. While applying these chemicals the persons involved in that work faces health problem. To overcome this he innovated the chemical drilling implement by using simple materials like 25 lit water bottle which is fit to the bullock drawn harrow. He also made adjustment to regulate the rate of application. This implement helps to apply those chemicals without any contact with human body and also helps in application of chemicals uniformly which is not possible by humans.



### Drip laterals rolling machine

Drip system was popular and area under system was increasing because of its usefulness under less irrigation water, farmers are eager in adopting drip and they will go for heavy investment. But after installation within three to four years the drip system may become useless in most of the farmers field because of improper handling of the drip laterals. For this kind of situations this farmer innovation becomes very useful. He innovated drip laterals rolling machine which is portable and can be drag across the field and roll the drip laterals very neatly without any bends. He employed the technique of umbrella folding and opening for this drip laterals rolling machine. Because of that after rolling of laterals it gives a bundle of drip laterals. With this implement we can easily roll the drip laterals without drudgery in handling and also saving time and also number of labours .It is most important to maintain the lifespan of laterals. Hence **drip laterals rolling machine** is one of the important technology at this juncture.





## ICAR-KVK RAMANAGARA

### Training on “Integrated crop management in Coconut, Mango and drought management techniques”

ICAR-Krishi Vigyan Kendra Ramanagara in collaboration with Department of Agriculture, Ramanagara organised one day training programme on “Integrated crop management in Coconut, Mango and drought management techniques” on 10.10.2023 at Balagangadharanatha Swamy institute, Channapatna (T), Ramanagara (D). Dr. Deepa Pujar, Scientists (Horticulture) briefed about good agricultural practices of coconut viz., Young plantation care and maintenance, adoption of proper spacing, intercrops, integrated nutrient and water management, use of micronutrients, integrated pest and disease management and mango viz., training and pruning practices, spray of mango special, integrated pest and disease management etc. Mrs. Shanta Balagond, SMS (DAMU) highlighted about drought management techniques, water harvesting structure and also about weather advisories. In this special occasion 50 farmers and farm women participated and got benefitted.



### “Creating awareness about conversion of Waste to Wealth”



ICAR-Krishi Vigyan Kendra Ramanagara is actively conducting the Special Campaign 3.0 on Swachhata. The initiative commenced with a preparatory phase on 15 September 2023, aimed at identifying specific targets to be taken up for cleaning for the main phase of the campaign, which is being conducted from 2nd October 2023 to 31st October 2023. The primary focus of this campaign is to enhance space management in offices and create awareness among the masses about Swachhata. Since the beginning of the preparatory phase of the Special campaign, KVK Ramanagara have identified various cleanliness sites across the Ramanagara district and emphasized the importance of Swachhata, Cleanliness drive, disposal of scrap and weeding out of files and other Swachhata related activities like Swachhata pledge, cleaning of office premises, awareness about parthenium and uprooting of parthenium weed, sanitizing and cleaning of dairy unit, cleaning of storeroom and godown, conversion of waste to wealth, preparation of vermicompost, weed management in field bean, kitchen garden, using hand weeder, creating awareness about Swachhata at government higher primary school and also in Villages for farmers and farm women etc.



### Innovation of Gravity Fed Irrigation System



**Sri Ramesh S/o. Gangahanumaiah,**  
Anchepalya, Tq. Magadi Cell : 9844163848

Electricity and water are the major inputs for profitable agriculture. Mr. Ramesh has successfully utilized his undulating land for gravity fed irrigation system. He has constructed water storage tank in higher elevation of capacity 80,000 ltrs and laid laterals, controlling valves and fertigation unit. With this system he is irrigating 10 acres of land. The system works on gravitational force and does not require any electricity. Also, he has adopted modern irrigation technique of Microlazers which helps in water saving and maintaining soil structure.





## ICAR-KVK THRISSUR

### Swachhata Activities

Swachhata Diwas was celebrated on October 2<sup>nd</sup>, organizing a cleanliness drive. The nearby roads and pathways of the Madakkathara Panchayat were cleaned, along with the KVK farm and all the demonstration units on the Swachhata Diwas. Plastic items were discarded, and all the staff showed commendable participation in the cleanliness drive. In the office too, many obsolete files were weeded out.

A few outdoor awareness campaigns were conducted in the fortnight in Thrissur District in Madakkathara Panchayat which aimed at promoting cleanliness in public places and maintaining cleanliness within the community. Upon request from ward member and police officials, major road area of the ward was also cleaned in order to avoid accidents. Vermicomposting was also popularized in different areas of Anthikkad Block Panchayat.



### Innovation of Solar trap



**Sri. Sinoj K.S.,**  
Kannankattil House, Cell: 9747920760

The different parts of the solar trap manufactured by the farmer consists of solar insect killer, solar panel 3 Watts, 6 volts Polycrystalline Aluminum shielded with tuff glass, battery 6 volts and enclosure with insect attractant yellow colour. A microcontroller with Frequency UV LED 380nm has also been set in it which attracts insect pests. The solar trap runs for about 2-3 hours. The approximate cost of the trap is about Rs. 3500/- . He finds the solar trap highly effective in vegetable fields wherein most of the pests are being trapped within first three days. He encourages the nearby vegetable farmers to keep the solar trap in their fields since pest infestation is very less in his field due to solar trap installed in the field.



## ICAR-KVK TRIVANDRUM



### Innovation of Manual Cassava Harvester - Agro Tapioca Plucker



**Sri. Jose V.V**  
Mutholakkudam

Jose Cheriyan invented semi- manual harvester in 2019, which works on the lever principle. KVK conducted Front Line Demonstration of this equipment at Malayinkeezhu, Chirayinkeezhu and Maranalloor Gramapanchayaths of Thiruvananthapuram districts during 2021-2022 and 2022-2023.

In an hour, 50-60 cassava plants can be harvested using farmer innovated equipment, while in manual method this would be only 12-15 numbers. The main merits of this small scale mechanization are drudgery reduction and around 75% of labour savings. Low cost and easy operating mechanism of the equipment becomes a farmer – friendly equipment at Thiruvananthapuram District.





## ICAR-KVK TUMKUR - I

### Training programme on millets for sustainable life

ICAR KVK Tiptur, Tumkur-1 in collaboration with Karnataka Biodiversity Board, Forest department Tiptur and Women and Child Welfare Department Tiptur organized training programme on millets for sustainable life on 04-10-2023 at KVK Tiptur. The programme was inaugurated by Dr. M. J. Chnadre Gowda, Pricipal Scientist, ATARI, Bangalore and Jagath Ram, PCCF and Member secretary, Karnataka biodiversity board. Dr. V. Govinda Gowda, Senior Scientist and Head highlighted about millets production to encourage sustainable food system. Dr. M. Padmanabhan SMS (Agrometerology) delivered a lecture on millets cultivation practices and its marketing. Dr. Nithyashree, K., Scientist (Home Science) delivered a lecture on millets processing, its value addition and its health benefits. During this programme millets recipe contest was also organized. Total 250 members participated in this training programme.

### Rearing of Backyard Chicks

ICAR KVK Tiptur, Tumkur-1 organized off campus training programme under SCSP programme on 11-10-2023 at Tadsuru village of Tiptur taluk. In this programme Swarnadhara Chicks were distributed to the SC beneficiary farmers. Dr. V. Govinda Gowda, Senior Scientist and Head inaugurated the programme and highlighted the importance of Rearing of Swarnadhara Chicks. Dr. Shivappa Nayak, H.B. Scientist (Animal Science) delivered the lecture on management of backyard poultry chicks. Dr. M. Padmanabhan SMS (Agrometerology) gave a lecture on feed management in backyard poultry chicks. Total 42 SC farmers were benefited.



**"A good farmer is nothing more nor less than a handy man with a sense of humus."**  
**E.B. White**



Innovator's  
Corner

Innovation of

**Tiller Mounted Seed Drill To Reduce Drudgery Of Livestock**



**Sri Shivakumar Swamy M. N., S/o. Narayana**  
**Basavanapura, Tq. Kunigal Cell: 9663465227**

Mr. Shivakumar swamy M. N., retired military officer and progressive farmer from Basavanapura, Ippadi hobli, Kunigal, Tumkur involved in agriculture after his retirement. He is having 5 acres of land and adopting improved agricultural practices with the help of own made power tiller operated seed drill which is helpful in sowing of agricultural crop and fodder crop through this the operation of sowing by the livestock has been reduced and also helpful in covering large area by limited time. This could be helpful for all the farmers in sowing operation and also reducing in cost of labour involved in sowing. This power operated implement is cost affective in manufacturing and easily functioning in all type of soil.





## ICAR-KVK TUMKUR - II

### Central team visited Tumakuru to assess drought situation

ICAR –Krishi Vigyan Kendra, Hirehalli scientist accompanied inter-ministerial central team (IMCT) led by Jal Aayog Director Ashok Kumar to drought prone villages of Koratgere, Madhugiri and Sira taluks with District team and district line departments officials. Visited drought affected plots of Groundnut, maize, Ragi, redgram. A team also visited to Dragon field as dry land crop.



**Save Water**  
from pollution  
and gift it to  
next generation.



*Innovation of*

### Artificial recharging for enhancement of ground water

**Sri. Mahesh.N.M S/o. Mudalappa**

**D.Nagenahalli, Anupnahalli Post Tq. Koratagere Cell: 9741048653**



ICAR-KVK Hirehalli has taken up the National Innovations in Climate Resilient Agriculture (NICRA) project since 2009-10. There are many Natural Resource Management (NRM) and crop management interventions advocated by the KVK which were adopted by the farmers. Of late, farmers themselves started developing their own innovations in the mentioned fields, taking the inspiration from the interventions. Sri. N M Mahesh is one such farmer from the NICRA village - Durgada Nagenahalli, Koratagere taluk of Tumakuru District. He has developed an innovative method of recharging bore wells. Due to the renovation of checkdams under the project by the KVK, his open well got additional seepage water. During peak monsoon season, the excess water gets overflow from the well. He innovatively diverted the excess water from open well, into his defunct bore well, through a pipe line. The pipe was connected between the open and bore well. Due to this, the excess water start pouring into the bore well and reach the bottom aquifers. This has recharged the bore wells in and around his field. About 32 bore wells have thus got recharged and started working. This has helped the nearby farmers to bring back about 8 ha area under irrigation, which was not so earlier. By considering this innovation, ICAR-Indian Institute of Soil and Water Conservation (Regional station at Ooty, Tamil Nadu) has awarded him 'Best Farmer Award - 2016' for his pioneering work on 'Artificial recharging for enhancement of ground water'. The award was given to him by the District Collector on 20-10-2016 on their Foundation Day. He is an inspiration to all the farmers in NICRA village and other adjacent villages.





## ICAR-KVK UDUPI

### Training for SCSP beneficiaries

Keladi Shivappa Nayaka University of Agriculture and Horticultural Sciences, Iruvakk, Shivamogga; Indian Council of Agricultural Research – Krishi Vigyana Kendra, Brahmavara, Udipi District and Zonal Agriculture and Horticultural Research Station, Brahmavara jointly organized one day training program for SCSP beneficiaries on 05.10.2023. The training program was inaugurated by Krishi Pandit awardee progressive farmer, Mr. Sathish Hegde Rattadi, Udipi Dist. He shared his experiences of growing himself as a full time agriculturist and gave valuable suggestions. Dr. Manjunath Adiga, Veterinary officer, Santhekatte, Udipi Dist., was a resource person who spoke on backyard poultry rearing. Dr. Revanna Revannavar, Associate Director of Research, ZAHRS, Brahmavara presiding over the function said for uplifting economically weaker, this kind of program could help Head of KVK Brahmavara, Dr. Dhananjaya B, welcomed the gathering with introductory talk, Dr. Acharya, S. compeered the program and Dr. Raviraj Shetty G delivered vote of thanks.



### Mushroom culture training



Keladi Shivappa Nayaka University of Agriculture and Horticultural Sciences, Iruvakk, Shivamogga; Indian Council of Agricultural Research – Krishi Vigyana Kendra, Brahmavara, Udipi District; Zonal Agriculture and Horticultural Research Station, Brahmavara and Diploma College of Agriculture, Brahmavara jointly organized one day training program on “Mushroom Culture on 09.10.2023. The training program was inaugurated by progressive mushroom farmer Mr. Murari Upadhyaya, Kumbashi, Udipi Dist. He emphasized on the scientific mushroom cultivation practices in order to achieve higher profits. Chief Guest, Dr. Raviraj Shetty, Scientist, KVK, Brahmavara, mentioned that mushroom cultivation is one among the low investment income generating avenues for rural youth. Dr. Lakshmana, Associate Director of Research, ZAHRS, Brahmavara presiding over the function said that mushroom is highly nutritive and can be good source of nutrition for rural India. Head of KVK Brahmavara, Dr. Dhananjaya B, welcomed the gathering with introductory talk, Dr. Santhosh Gowda was a resource person for the training, while Dr. Sachin U. S compeered the program and delivered vote of thanks.



### Innovation of Cycle pin water sprinkler



#### Sri Mr. Gunapal Kadamba Shirlalu, Tq. Karkala

Mr. Gunapal Kadamba, a progressive farmer from Karkala Taluk, Udipi Dist., brought about an innovation to prepare a cost effective water sprinkler. In order to avoid the cost of sprinklers, he used discarded bicycle wheel spoke pins as water jets inserted into PVC hose pipes. This innovative method of irrigation can spray water at higher rate and reduces electric power consumption than conventional sprinklers. Mr. Gunapal uses this methods to irrigate his 13.5 acres of farmland that follows IFS model consisting of araca, pepper, coconut, papaya, pineapple, sapota and other crops.





## ICAR-KVK UTTARA KANNADA

### Training to Extension functionaries on Plant protection

ICAR KVK Uttara Kannada Sirsi in collaboration with Karnataka State Department of Agriculture Uttara Kannada organized one day training programme on Plant protection measures in Paddy and Maize to ADA, AO, AAO, ATMA Staff (BTM and ATM) of Uttara Kannada. The rainfall pattern during 2023 in Uttara kannada is very erratic and majority of the taluks are declared as severe and moderate drought. No rains were received during June, Excess rains were received in July. This led to delayed planting of paddy in both coastal and upghat regions. August rains were very less, September climate was combined with both drizzling rains and hot sun. This situation created upsurge in the occurrence of insect pests viz., leaf folder and diseases especially blast. Minor insect pest hispa created havoc in Gokarn area damaging approx. 20 Ha. Based on our survey results, training was planned to agriculture department staff about insect pests and diseases of Paddy and Maize on 11.10.2023 at KVK Sirsi. Programme was inaugurated by Dr. S. A. Gaddanakeri, ADE, UAS Dharwad and highlighted the role of agronomic practices in management of insect pests. Another guest Dr P. Nagaraju, Nodal officer of KVK's of UAS Dharwad shared his experience about management of diseases and highlighted on emerging smut disease in paddy. About paddy and maize insect pests, biology, damage symptoms, favourable climatic conditions and management were covered by Dr. Roopa S. Patil, Sr. Scientist and Head, KVK Uttara Kannada Sirsi. Dr. V. Suryanarayana, Professor (Plant Pathology), College of Forestry dealt in detail about blast disease in Paddy. Shri. Honnappa Gouda, JDA, Uttara Kannada gave presidential remarks and mentioned about active involvement of all staff in creating awareness to farmers. Programme was concluded with vote of thanks by Shri. T. Nataraj, DDA, Sirsi.



Innovator's  
Corner



Innovation of

Value addition to minor forest fruits



**Sri. Ganapathi Ramakrishna Bhat**

At : Talegere, Tq. Honnavar

Cell No : 9845053024

Value addition to minor forest fruits viz., Syrups and squashes from Garcinia spp, Amla + Ginger, Ginger + lemon, Lemon+honey, pineapple, Brahmi, Cynadon, Jamun etc.



23/10/2023 10:13





## ICAR-KVK VIJAYAPURA-I

### A capacity building programme on production and value addition of oilseeds to FPO's member

ICAR-KVK Vijayapura 1 has the aim to enhance farmers' competitiveness and increase their advantages in emerging oil seed market opportunities. So, that KVK has identified FPO on oil seed in Basavan Bagewadi for conducting a capacity building programme and value addition of safflower on 09.10.2023 in KVK. Dr. S.M. Vastrad., Senior Scientist and Head, Shri. P.S. Pattanashetti., President FPO Shri. Siddu Pujar., President FPO all KVK scientist and staff of KVK participated in the inauguration the programme. First session was on crop production technologies in safflower was carried out by Dr. Mallappa. B., technical officer, insect pest and disease in safflower and their management by Dr. S.M. Vastrad, Senior Scientist & Head and Dr. Prakash, Scientist(Entomology), oil extraction & processing and value addition session by Shweta A. Mannikeri, SMS (Home Science) and different apps and software technologies for FPO's management and marketing was explained by Shri. Shrishail Rathod., Senior Technical Officer. KVK Vijayapura.

Second session by Shri Siddu Pujar, President, Federation of FPO's on need and role of FPO in upliftment of farming community, how farmers can lead the FPO in a successful way. Which are the sustainable things for A total 34 farmers and 11 director of FPO benefited by this programme.



### Role of ICT in the grass root level of farming community



ICAR-KVK Vijayapura 1 in collaboration with the Dr. S.S.Kagi Joint Director Directorate of Oil seed Development, Hyderabad conducted ICM off campus training programme on 12.10.2023 in Kaggod village, Vijayapura. In this training Dr.S.S.Kagi, DOD explained about importance and need of updating of farmers details at different stages in Krishi Mapper app., He explained how to load the data in App. Dr. S.M.Vastard and Dr. Shweta A. Mannikeri updated CFLD beneficiaries details in the app. Dr. S.M. Vastrad, Senior Scientist and head, discussed about crops and explained about the pest & disease in red gram & sunflower low cost management technology. Smt. Shweta A. Mannikeri, SMS (Home Science) explained about the different machines and equipment used for oil extraction and dhal processing.



### Innovation of

### Incredible "Desi Products" By Women Agro Entrepreneurs



### Smt. Laxmi Shirmgond

Babaleswar Cell: 9900875944

Smt. Laxmi Shirmgond who is 35 years agro-entrepreneur made a fortune from beautifully and strategically involved her in animal husbandry specially desi breeds and she prepared milk and milk value added products like desi ghee, desi ghee nose drops and other desi ghee products. She also used cow dung and urine for production of Vibhuti, cow dung cake, cow dung deepa, arka, dhooam, cow dung and vermin compost, jeevamurtha, cow krupa amurtha, Dashparani and Ghan Jeevamurtha etc. She adopted integrated farming system and organic farming. She took responsibility in conservation of desi breeds of cow. Her annual income is 120000. She sold her products through online marketing and different apps. University of Horticultural Science, Bagalkot identify her efforts and innovative in horticulture field awarded as "Shresta Totagarike Award". She also won Krishi Udayanmukha award from Karnataka State Agricultural Department at state level





## ICAR-KVK VIJAYAPURA-II

### Swachh Bharat Campaign 3.0 at Government High School, Indi

Under the “Swachh Bharat Mission”, a Swachhta Awareness campaign with emphasis on cleanliness and disposal of waste material conducted in Government Girls High School at Indi. Keeping in mind the objectives of the mission, a “Swachhta ” was administered to the School children’s, teachers and parents. All School Children’s resolved to strive for cleanliness, sanitation and hygiene in and around their School and vicinity. Dr. Veena Chandawari Home Scientist, sensitized them about various factors responsible for creating garbage and unhygienic conditions in and around their School. She elaborated upon the need to adopt a system of periodical cleanings, maintenance and initiation of preventive measures for containing of diseases. She also stressed upon positive thinking, good health and personal hygiene and how these factors may contribute to improve their financial condition by reducing expenditure on treatment of diseases at one hand and by converting garbage and agricultural waste in to compost for using in agriculture on the other hand. They were educated to understand difference between biodegradable and non biodegradable waste and advised to collect and segregate garbage and waste and dispose off accordingly.

On this occasion, School Head master and all subject teachers also participated in the campaign with a high sense of enthusiasm and devotion and thanked the institute for enlighten them on cleanliness.

**Dr. Veena C, Scientist (Home Science) &**

**Dr. Shivashenkaramurthy M, Senior Scientist & Head,**



Innovation of

### Organic Black Rasin Production Technology



### Sri. Iranna Kudari

Village Ahirsanga Tq. Indi Cell: 9964584625

Growing grapes in organic method, the bunch of green grapes is dipped in hot water of about 40-450 degrees Celsius for 2 minutes, the bunch of grapes is removed and dried in the shade, and the green grapes are dried in 42-45 days without using any chemicals. It is Rs. 450-600 per kg sold.





## ICAR-KVK WAYANAD

### One day capacity building programme on Mushroom Cultivation

KVK Wayanad had conducted one day Mushroom training programme for Tribal farmers from Thirunelly grama panchayath in connection with Kudumbasree Mission as part of Thirunelly Cooperative Tribal Development Programme at KVK Wayanad. In this event Sri. Sai, Kudubasree programme Coordinator welcomed the gathering. Dr. Safia N.E, Senior Scientist and Head KVK Wayanad inaugurated the function. Classes on mushroom spawn production, mushroom bed preparation, pest and disease incidence, value addition etc were handled by Smt. Sruthi Krishna, Research Assistant, KVK Wayanad. The demonstration on mushroom bed preparation was also conducted. Mushroom spawn distribution to the participants was done by Dr. G.S Arularasan, Assistant Professor, KVK Wayanad. 15 farmers actively participated in the event.



### Entrepreneurship Awareness Camp



Internal officials from KVK Wayanad had participated in Entrepreneurship Awareness Camp on AGRO-BASED SCIENCE, TECHNOLOGY & INNOVATION HUBS PROJECT supported by Department of Science and Technology, Govt: of India. The event was implemented by SWADHESHI SCIENCE MOVEMENT KERALA ORGANISATION conducted at Edavaka panchayath hall. In this event, Sri. Sajeesh T.S, Wayanad Project Coordinator welcomed the gathering. Smt. Gincy Binoy, Chairperson, Welfare Standing Committee Presided over the function and Sri.H.B Pradeep Master, Panchayath President inaugurated the function. Sri. George Padakkutil, Chairman, Development Affairs Standing Committee, Sri. Shihabuddin Ayath, Chairman, Standing Committee on Health and Education and Smt. Priya, CDS, Chairperson given felicitation to the gathering. In the camp, classes were lead by Dr. Safia N.E, Senior Scientist and Head, KVK Wayanad and Dr. Arularasan G.S Assistant Professor, Agricultural Extension KVK Wayanad. There was an active participation of 40 farmers in the event.



### Innovation of Solar fencing device



**Sri. Ayyappan C,**  
Pilakkavu House, Naikketti



Farming for those who have fields on the fringes of the Wayanad wild life sanctuary is not an easy task due to the recurring crop raids by wild animals including elephant, wild boar deer and porcupine. The farmer received training from forest department and has started installation and maintenance of solar fencing to help farmer to protect their crops. The method adopted by Mr.Ayyappan was successful and could be replicated by others also for effectively deter wild animals from raiding crops





## ICAR-KVK YADGIR

### Inauguration of New Administrative & Farmers Hostel Building

ICAR-KVK, Yadgir, Kawadimatti new Administrative & Farmers hostel building was inaugurated on 13.10.2023 by Hon'ble Sushri Shobha Karandlaje, Union Minister of State Agriculture and Farmers welfare, and Hon'ble Sri Sharanabasappa Darshanapur, Minister of Small Scale Industries, Public enterprises, Govt of Karnataka. Sushri Shobha Karandlaje appreciated the new technologies in agriculture for surplus food grain production to feed the entire nation & export to the other countries. This is happening because of sincere efforts of Farmers and Scientists involved in agriculture and congratulated the farmers for feeding the nation and exporting agriculture and agriculture production in large quantities to other nations. Agriculture produces from India are being preferred globally and millets are getting significance in the international year of millets she added. She emphasizes the importance of organic farming, natural farming and promotion of eco-friendly agriculture with a budget provision of Rs.1500 crores from Government of India. She urged to utilize the new technologies, information and training from Krishi Vigyan Kendra to double the income of the farmers. ICAR released more than 1500 varieties suitable for different biotic and abiotic stress management can be adopted by farmers to mitigated climate changes like drought, salinity and flood situation etc. Central government provided Rs.1.00 lakhs crores towards farmers infrastructure facilities can be utilized for processing and value addition to agriculture produce. Sri Sharanabasappa Darshanapur Hon'ble Minister of Small Scale Industries, Public enterprises requested the farmers to utilize the scientists of Krishi Vigyan Kendra for dryland farming, Horticulture, Animal husbandry and Integrated farming system to enhance the income of farmers under increasing population and decreasing in land holding capacity of farmers. Dr.M.Hanamanthappa, Hon'ble Vice Chancellor of UAS Raichur urged the farmers to utilize the irrigation land in Yadigir district to achieve sustainable agriculture and adaption of allied activities to double the income of farmers. ICAR, ATARI-XI, Bengaluru, Director Dr.V.Venkatasubramaniam, Registrar D.M.Veerangouda, Director of Extension Dr.Goudappa, Hon'ble Board member Mallikarjun D., Department officials and more than 2000 farmers participated in the programme and graced the occasion. For the benefit of the farming community Agriculture Exhibition, Stall fed sheep and goat rearing system, Millet Processing unit, Fodder block, Seed production of Pigeon pea and Paddy, Horticulture nursery, application of drone technology in agriculture, Devani and Kalyana gidda breeds were exhibited in the function.



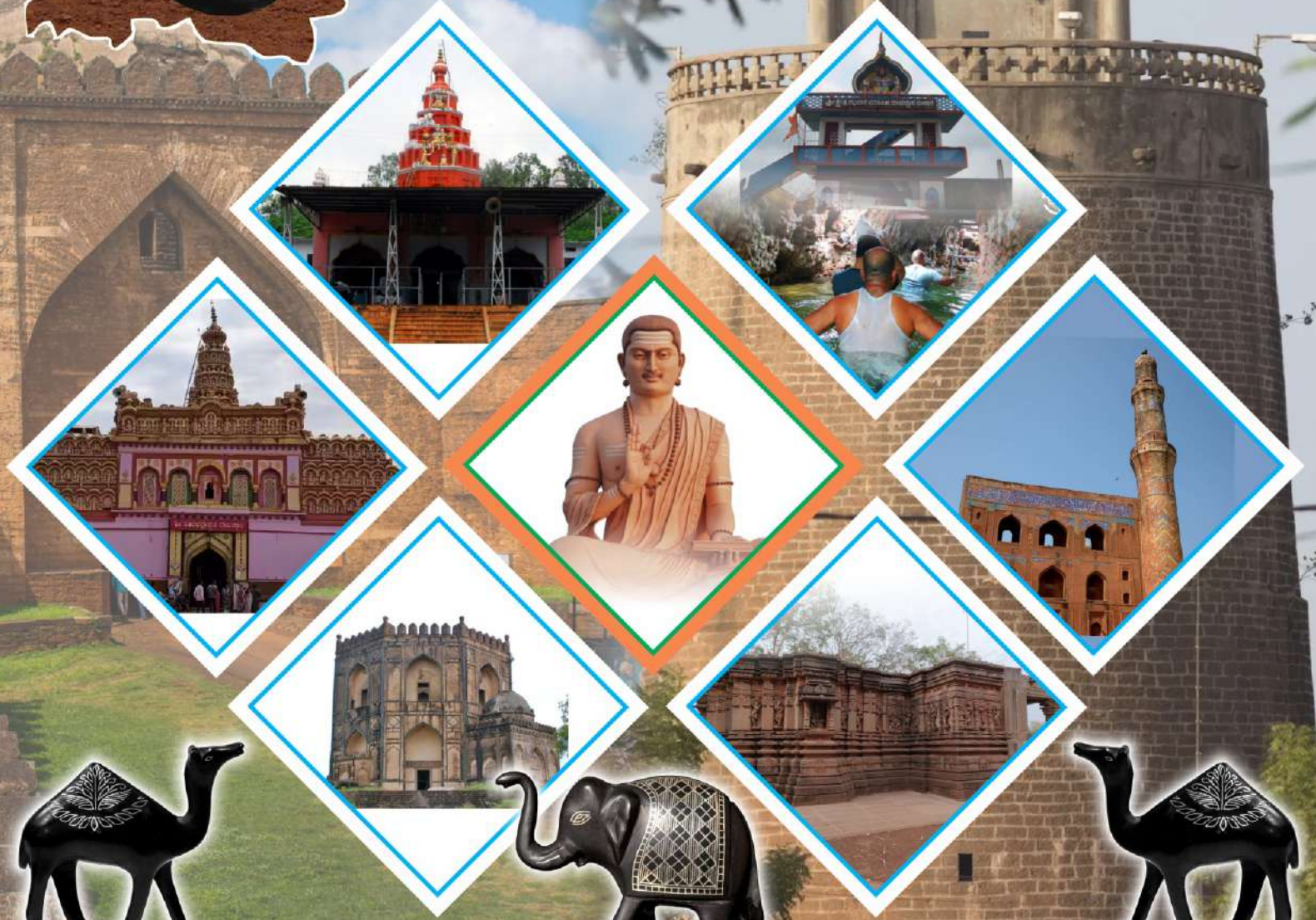
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Royal City  
BidAR



Royal City  
BidAR



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