



## SIGNING OF MoU BETWEEN PCSIR AND CSTTC CHINA DURING 3rd PAK-CHINA TECHNOLOGY TRANSFER MATCH MAKING WORKSHOP AT KUNMING, CHINA

A MoU regarding “Establishment of China South Asia Technology Transfer Center Sub Center Pakistan” was signed between PCSIR and the China-South Asia Technology Transfer Center during 3<sup>rd</sup> Pak-China Technology Transfer Matchmaking Workshop on 16-18 August, 2023 at Kunming, China. The workshop was attended by Member (Science) Dr. Sarwat Ismail along with other 19 delegates from PCSIR, MoST and other representatives of different public/ private sector R&D organizations, academia, and enterprises from Pakistan. The main objective of the MoU is to extend the construction of CSTTC – Sub Center Pakistan at PCIR with the aim of strengthening bilateral technology transfer, enhancing cooperation among enterprises, research institute and universities and supporting cooperation in the pursuit of science, technology and innovation for sustainable development in the belt and road initiatives between the two countries.

The workshop was organized by the Department of International Cooperation of Ministry of Science and Technology of the People's Republic of China, and International Liaison Wing of the Ministry of Science and Technology Pakistan. The Workshop's co-organizers included the China-South Asia Technology Transfer Center (CSTTC) and the Department of Science and Technology (DOST) of Yunnan province, China, and Pakistan Council of Scientific and Industrial Research (PCSIR) under the Ministry of Science and Technology in Pakistan. The theme of the workshop was “Connecting STI Resources to Empower High Quality Development of China-Pakistan Economic Corridor”. It served as a platform for attendees to exchange ideas, matchmaking and identify technologies and partners particular in fields of biotechnology modern agriculture, information technology, new materials, and addressing climate change. At the end of workshop, the areas of interest for collaboration with China in Technology

Transfer were discussed in detail and identified the Chinese counterparts to enhance the fruitful match making in areas of climate change (water and sanitation), food security, mineral processing, solar plants, smartagriculture, etc.



To be continued...

The Chinese Ministry of Science & Technology has declared this event, a successful event and have an intent to invite Pakistan to move further in the identified areas of interest.



## DIRECTOR GENERAL PCSIR LAHORE ATTENDED THE BOARD MEETING OF PAFDA WITH CHIEF MINISTER PUNJAB

Dr. Quratulain Syed, Director General, PCSIR Labs Complex, Lahore attended the board meeting of PAFDA (Punjab Agriculture Food & Drug Authority) with Chief Minister Punjab.



## CELEBRATION OF 75TH INDEPENDENCE DAY OF PAKISTAN

The Independence Day of Pakistan was commemorated by the employees of PCSIR Laboratories Complex, Karachi, the event being graced by the presence of Director General, KLC Dr. Hafiz Rabnawaz, and Director P&D Dr. Razia Sultana, along with other Head of Centers and Officials of KLC. The recitation of verses from the Holy Quran marked the commencement of the ceremony, followed by the Nat-e-Rasool. The honour of hoisting the Pakistani flag was performed by Dr. Hafiz Rabnawaz, who in his address to the audience, emphasized the need for Pakistan to move towards advancement in the field of science and technology, urging the employees of PCSIR Laboratories to play their roles to their greatest efforts in the development of the country. Further speeches by Admin Officer Mr. Aslam Khan and Dr. Tahir Rafique highlighted the blessings bestowed upon the nation of Pakistan by Allah SWT and honoured the valiant martyrs of Pakistan whose unwavering gallantry brought about the independence of Pakistan. The ceremony concluded with a Dua made in congregation for the future of Pakistan.

## MEMBER TECHNOLOGY VISITED PLC & IL

Member Technology/ Project Director NCHM, Mr. Sohail Ameer Marwat has visited the site of botanical garden, developed under PSDP Project NCHM and shared his valuable suggestions with team on August 3rd, 2023.





The Member Technology along with his technical team including Mr. Ghulam Shabbir Director Technology, Mr. Nazar Ahmad Bhutta Director Works, have visited PCSIR Laboratories Islamabad (IL) on September 18, 2023. Director, IL, Dr. M. Tehseen Aslam has given presentation in his office. The Member Technology has visited all sections / laboratories in IL and interacted with scientists and discussed the progress / working environment.

## LEASING OUT OF RED CHILI SAUCE FORMULATION

Process and formulation of Red Chili Sauce was leased out to Food Technology Centre to Mr. Arbab Dilawar Habib CEO: M/s Yammy Yard, Hayatabad Peshawar.



## VISITS/MEETINGS

● The Anti-narcotics Force Academy (ANFA) Islamabad has contacted PCSIR Laboratories Islamabad for providing them technical assistance in establishment of Forensic Laboratory in ANFA at H-11, Islamabad. PCSIR has gone some technical sessions to understand their requirements / expectations / scope. In this regard a team of PCSIR Labs Islamabad including Dr. Muhammad Tahseen Aslam (Director IL), Dr. Fouzia Noreen (SSO), Mrs. Razia Kalsoom (SSO) & Mr. Abdullah (JTO) visited ANF Academy Islamabad on July 18, 2023 and discussed on-site solutions for establishment of Forensic Laboratory.



● **Visit to Sethi Soap Industries Islamabad** Mrs. Razia Kalsoom (SSO), Fouzia Hussain (SSO) & Mr. Abdullah (JTO) visited Sethi Soap Industries Islamabad on July 18, 2023 and discussed about the establishment of testing Laboratory.



● **Visit at Topma, Kakul Abbottabad** Dr. Uzma Rashid (SSO), Fouzia Hussain (SSO), Abdullah (JTO) visited PMA, Kakul Abbottabad on August 16, 2023 and discussed the serious issues of Typhoid outbreak on massive scale in the academy.



## ToRs/AGREEMENTS/MoU

● ToRs signed Between PSTC Karachi and Hamdard University The signing of the Terms of Reference (ToRs) between PSTC Karachi and Hamdard University marks a pivotal collaboration facilitated by the Technology Development Council headed by Director Engr. Syed

Farhan Hamid Ali, a delegation from PSTC visited Hamdard University to formalize this partnership. In the esteemed presence of Vice Chancellor Dr. Shabib-ul-Hassan, the ToRs were signed by Registrar Mr. Kaleem Ahmed Ghias and Chairman of Tech DC Brig. R Tariq Hussain Khan. This significant step forward serves as a promising avenue for advancing education and fostering achievement, particularly benefiting PSTC graduates in their pursuit of advanced educational opportunities. The collaboration holds great potential for mutual growth and development.



● **An agreement signed between DSC-PCSIR & M/S SRSP** An agreement was signed on September 27, 2023 between PCSIR -DSC and M/s SRSP Peshawar regarding training on Marble Mosaic for students of merged districts of KP.



● **KLC signed ToRs with Dollar Industries** Dollar Industries are leading stationary manufactures in Pakistan. They also export their products to more than 50 countries around the globe. Dollar is a credible and reliable name across Pakistan. The company is continuously growing and bringing innovative products in the market, hence, they seek expertise from PCSIR to help them for collaborative R&D activities. Terms of References (ToRs) were signed with Dollar Industries Pvt. Ltd. Karachi relating to “Transfer of Process of Pencil Durability testing/method” on August 28, 2023. These TORs were signed by Dr. Rashid Ali Khan CSO/ HOC PRC and Dr. Hafiz Rabnawaz DG KLC on behalf of PCSIR Labs Complex Karachi.

## WORKSHOP/SEMINAR/LECTURES

● July 14, 2023 Engr. Aneel Ahmed (HOD Mechatronics) Szabist University conducted a counselling session today at PSTC Karachi, providing valuable information about their educational programs. As part of their collaboration, they offered PSTC graduates special benefits,

for future education in B.E (Mechatronics) at Szabist University. The session shows the mutual interest of both institutions in establishing a long-term partnership for future collaborations.



● A workshop was conducted by PSTC Karachi, at Mehran University of Engineering & Technology Jamshoro, in collaboration with the IEEE IMS MUET Student Branch Chapter and the Department of Electronic Engineering. The workshop was organized with the support of the IEEE ComSoc. Director PSTC along with the faculty of Electronic Department of PSTC was invited for conducting the said workshop. Invitation extended to PSTC by Mehran University was a commendable gesture, highlighting their commitment to fostering knowledge sharing academia collaboration.



● Tuesday, July 18, 2023 a meeting at Hamdard University with the Dean of Engineering Science and Technology Mr. Amir Saleem & TechDC Representative Muhammad Amash Director Strategic planning to discuss exciting future plans for final year students of BSc technology programs. Vice Chancellor Dr. Syed Shabib Ul Hassan presented a shield to Director PSTC Engr. Syed Farhan Hamid Ali along with Mr. Azam Ali Noori. The agenda was to discuss the opportunities of the Tech industry whilst exploring valuable industrial linkages. Exciting times ahead for the students as they prepare to embark on their professional journeys. Stay tuned for more updates on this collaborative endeavor.



● An orientation session was organized by DHA Suffa University's Mr.Navaid Ahmed Khatri ILO, & Associate Professor Ms. Saffa, featuring at PSTC. Students displayed keen interest in pursuing further studies in B.E. Mechanical at DHA Suffa University. The university also expressed a strong interest in potential future collaborations with PSTC.

● July 19, 2023, the certificate distribution ceremony for NAVTTC Prime Minister Skill Youth? Development Program Batch III took place at the Pak Swiss Training Centre in Karachi. Mr. Abdul Wahab Attari, (HOD Education Department) at Dawat-e-Islami, was invited, along with his team, to present certificates to the successful students. Director PSTC Engr. Syed Farhan Hamid Ali presented a shield to honorable guest Mr. Abdul Wahab Attari as a gesture of appreciation.



● Mr. Muhammad Saleem-Uddin Feroz, Chairman Pakistan Plastic Manufacturers Association (PPMA) paid a visit to PSTC Karachi on Monday August 28, 2023. Mr. Noman, Member PPMA, & S.M.Anwar, Editor-in-Chief, PAKPLAS were accompanied. The purpose of the visit was to oversee the training being provided to students at PSTC. They focused on upgrading machinery & equipment of PSTC to enhance the quality of training. The Chairman PPMA extended his appreciation the role of Director PSTC for the excellent training being imparted. Discussions were held between the Chairman and Director PSTC regarding potential future collaborations between PPMA and PSTC.



● One day Workshop cum Training session on “Patent Application Filing and Drafting” was successfully organized in PLC auditorium on September 21, 2023. Mr.Ghulam Mujtaba Kamal from IPO was the focal person. The interactive session was very informative and definitely will be fruitful for the Scientists and Engineers to promote and improve the “Patent Drafting and Filing”.



## PATENTS OBTAINED

<b>Title:</b> <b>Inventors:</b> <b>Patent No.</b> <b>Dated:</b>	Gene Bank Submission: Production of Phytase from Probiotic Strain HS1 Dr. HafsaSattar, Dr. SaeedaBano, Dr. Samina Iqbal and Hameed Waheed Accession # OR575051 20-09-2023
<b>Title:</b> <b>Inventors:</b> <b>Patent No.</b> <b>Dated:</b>	A formulation for the production of Hyssopusofficinalis cough cure syrup using Milstone Start ATC-400 Microwave Extractor System Dr. Nighat Sultana and Mahmood ul Hassan 144162 24-08-2023

## PATENTS FILED

1. Extraction of natural food grade marigold dye from orange peel, by Mrs. Alim-un-Nisa, Dr. Qurat-ul-Ain Syed, Dr. Shahid Masood, Dr. Adil Hussain, Mr. Faizullah Khan, Dr. Muhammad Ashraf, Dr. Asma Saeed, Patent Application # 476/2023, 24-07-2023.
2. A novel process for the extraction of soda ash from halophytes by Dr. Asma Saeed, Mrs. Shabana Kausar, Dr. Asma Sheikh, Mr. Muhammad Azam, Dr. Qurat-ul-Ain Syed, Dr. Syed Hussain Imam Abidi, Patent Application # 497/2023, 08-08-2023.
3. Fabrication of floating fish feed machine by Dr. Asma Saeed, Mr. Muhammad Azam, Mrs. Shabana Kausar, Dr. Asma Sheikh, Mr. Shahid Sameer, Dr. Qurat-ul-Ain Syed, Dr. Syed Hussain Imam Abidi, Patent Application # 499/2023, 08-08-2023.
4. Development of a novel preservation method for fresh rose petals using edible sugar coating with improved shelf life by Mrs. Alim-un-Nisa, Dr. Asma Saeed, Dr. Syed Hussain Imam Abidi, Dr. Qurat-ul-Ain Syed, Dr. Shahid Masood, Dr. Adil Hussain, Mr. Faizullah Khan and Dr. Muhammad Ashraf, Patent Application # 498/2023, 08-08-2023.
5. Meat and yogurt invigorated bread recipe and making methodby Shamma Firdous, Sajila Hina, Dr. Muafia Shafiq, Dr. Naaz Abbas, Dr. Quratul Ain Syed, Rabia Yasmeen, Dr. Ijaz Ahmad, Dr. Asma Saeed, Dr. Syed Imam Hussain Abidi, Patent Application #139/2022, 16-08-2023 (revised).
6. Multi-mineral and natural flavonoids product with enhanced bioavailability of calcium, magnesium, phosphorus, zinc and iron by Shamma Firdous, Sajila Hina, Muafia Shafiq, Dr. Ijaz Ahmad, Dr. Quratul ain Sayyed, Dr. Syed Hussain Imam Abidi, Patent Application # 408/2018, 16-08-2023 (revised).
7. An Integrated Approach for Facile Synthesis of Graphene Nanoparticles by optimizing various steps of Upgraded Hummer's Method by Sumaira Nosheen, Dr. Syed Hussain Abidi, Dr. Qurat-ul-Ain Syed, Engr. Muhammad Irfan, Farzana Habib, Engr. Bilal Waseem, Engr. Badaruddin Soomro, Engr. Hamza Butt Application/ Registration Number # 416-2021, 30-08-23.
8. Fermented Feed block as a promising source of organic protein for ruminant livestock by Dr. Rubina Nelofer, Dr. Muhammad Asif, Dr. Muhammad Nadeem, Dr. Abid, Dr. Quratulain Syed, Mr. Najeebullah, Dr. Salman, Patent Application # 649/2023, 26-09-2023.
9. Designing of Cureless Axial Flux Permanent Magnet Generator for Wind Power Generation (AR RA' AD) by Dr. Nighat Sultana, Adeel Ahmed Khan, AmanullahLakho, Arif Karim, Ghulam Hussain Ch Ahsan Sajid, Faisal Ghazanfar, Kazim Raza, Mansoor Hai and Tariq Mugal, Patent Application # 647/2023, 26-09-2023.