PLASTIC WORLD

AN OFFICIAL ORGAN OF ALL INDIA PLASTIC INDUSTRIES ASSOCIATION

VOL XLI | No. 12 | Visit us at : www.aipia.org | December, 2024

POLYTACTICS

Creative Additive Value

Dream the Colour we make it true

Manufacturers of Plastics Masterbatches & Speciality Plastic Additives

MANUFACTURERS OF

- UV MASTERBATCHES
- PEARLESCENT MASTERBATCHES
- BLACK AND WHITE MASTERBATCHES
- OPTICAL BRIGHTER MASTERBATCHES
- FR MASTERBATCHES
- SPECIAL MASTERBATCHES
- COLOUR MASTERBATCHES
- CALCIUM FILLER MASTERBATCHES
- COLOUR CHANGING MASTERBATCHES
- TRANSPARENT MASTERBATCHES
- EVA MASTERBATCHES
- PVC MASTERBATCHES

2979, Old Bus Stand Road, Tri Nagar, Delhi-110035
+91-9268113982 | +91-9899790975 | +91-9891060923
info@rgpolytactics.com rgpolytactics.com

Landmark Extrusion & Engineering

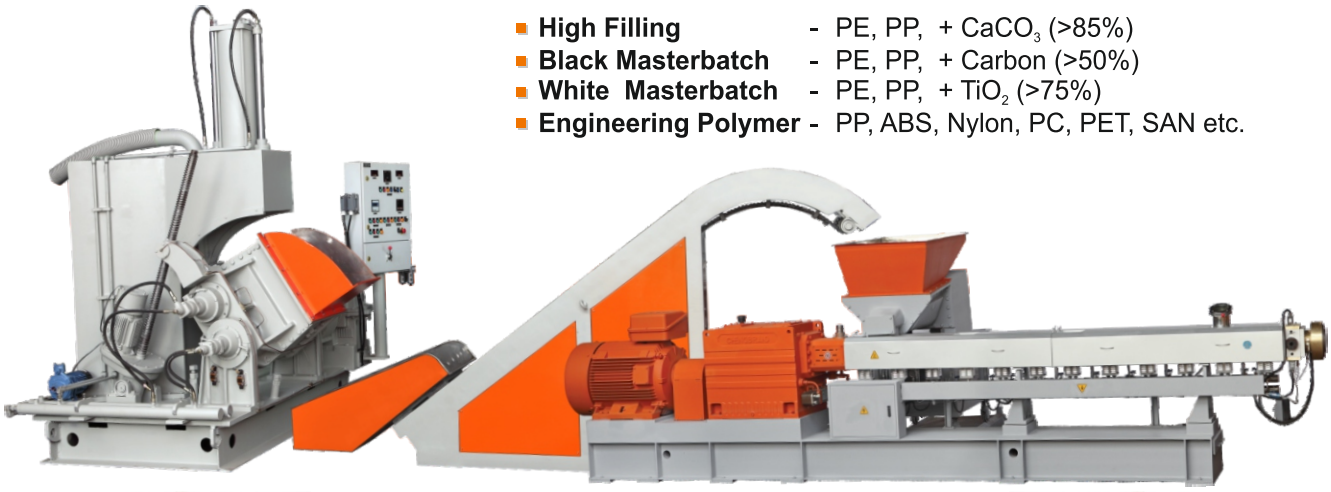
Growing Globally

- Masterbatches
- Filler Compound
- PVC Compound
- EVA Compound
- Engineering Compound

Pelletizing Line with Air / Water Ring Die Face Cutting System

India's FIRST Hybrid Kneader with Co-rotating Twin Screw Extruder

- **High Filling** - PE, PP, + $CaCO_3$ (>85%)
- **Black Masterbatch** - PE, PP, + Carbon (>50%)
- **White Masterbatch** - PE, PP, + TiO_2 (>75%)
- **Engineering Polymer** - PP, ABS, Nylon, PC, PET, SAN etc.



H 1347 DSIIDC Industrial Area Narela New Delhi-110040 INDIA

+ 91 9873252699 + 91 11 45151699

landmarkextrusion@gmail.com sales@landmarkextrusion.com

www.landmarkextrusion.com

RANG MAHAL ®

COLOUR MASTER BATCHES

MAKE IN INDIA

Dream the colour we make it True..

Household Industry

Biodegradable Products

Cosmetics Industry

Woven sec & Non Woven

Automobile Industry

Paint & oil Industry

Electronic Appliances

Plastic Furniture

Toy Industry

Multi & Mono Filament

Water Tank & Coolers

Pipe & Profile

SACHDEVA POLYCOLOR PVT. LTD.

ISO 9001:2015 Certified Company

- White & Black Masterbatches
- Pearlescent & Special Effect
- Mineral Filled Compounds
- Fluorescent & Custom Colour
- Additives,UV & Food Grade
- Transparent & Brightener Masterbatches

UNIT 1:- E-149, Sec-1, DSIIDC, Bawana Industrial area, Delhi - 110039

UNIT 2:- Plot no-26, Sector-7A, Reliance MET, Yakubpur, Jhajjar, Haryana, India- 124103

Contact us :- 7290076464, 8744057800, 8081818132, 8081818162

Write us :- info@sachcolor.com, sachcolor25@gmail.com

www.sachcolor.com

Visit us at Our Website : www.aipia.org

CONTENTS

EDITORIAL	....	15
ASSOCIATION ACTIVITIES	....	16
IMPORTANT POINTS DISCUSSED	....	17
ARTICLES	....	18-23
NEWS CONCERNING PLASTICS	....	24
INTERNATIONAL NEWS	....	30
NEWS IN BRIEF	....	35
TARIFF DIRECTORY 2025	....	36

Published & Printed by
Shri PARSHOTAM KUMAR
at
Manish Comprint
F-117, Sudershan Park, New Delhi-110015
Phone : 41037172 for
All India Plastic Industries Association
203, Hansa Tower, 25, Central Market, Ashok Vihar, Delhi-110052
Phone : 011-49064336
E-mail : aipiadelhi@gmail.com
aipia1982@rediffmail.com,
Website : www.aipia.org

ADVERTISERS'S INDEX

COVER

Shree Nath Ji Dyestuffs	....	**Front Cover**
RG Polytactics	....	**Front Inside**
RK Engineering Works	....	**Back Inside**
Anoopam India Pvt. Ltd.	....	**Back Cover**

INSIDE

Arun Polyvinyl (India) Pvt. Ltd.	.....	**2**
Berlia Electricals Polymer Pvt. Ltd.	....	**40**
Indusfood Manufacturing	....	**37**
JK Paras Polycoats Limited	....	**39**
JP Polymers	....	**3**
Kansal Polychem Industries	....	**2**
Landmark Extrusion & Engineering	....	**1**
Sachdeva Polycolor Pvt Ltd	....	**4**
Star Flex International	....	**38**

A Flex	....	6
C.R. Electricals	....	7
Chander Electricals	....	16
Deluxe Engineering Works	....	12
Gogia Plastic Traders (P) Ltd.	....	8
Jai Durga Enterprises	....	6
Lala Plastico	....	34
M.G. Electronics	....	13
Naresh Engineering Corporation	....	9
New Kunal Plastic	....	19
Sachdeva Plastic	....	11
Sanjay Machinery	....	10
Shree Ganesh Industries	....	14

DELUXE
ENGINEERING WORKS

A RENOWNED NAME IN "WEB GUIDE SYSTEMS" SINCE 1990

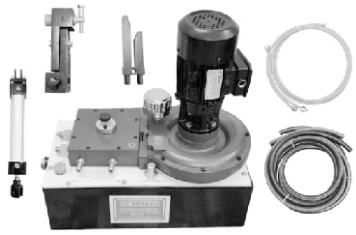
Deluxe Engineering Works is one of the leading companies and extensively recognized for providing the best Web Guiding Solutions for Web/Film Handling. With having more than 30+ years of experience and 5,000+ instalments in flexible industry, we have built such robust and steady foundation with an extremely skilled team, that we do not only offer our products laden with most supplicated features, but also provides commitment to best after sale services and support in the industry.

***Our Main Products*: -**

- **Pneumatic-Hydraulic Web Guide System**
- **Electronic Web Guide System (Edge Guide System / Line Guide System)**
- **Rewinding Machine (Cantilever - Batch Coding / Double Sided Plate)**
- **Air Shafts for Unwinder & Rewinder Stand**
- **Trim Winder for Slitting Machines**

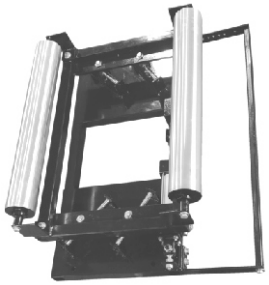
***Our Special Products*: -**

- **Static Control Technology – FRASER, UK**
- **Web Video Inspection System – UNILUX, USA**
- **Auto Registration Control System – TAIYO, Japan**
- **100% Inspection System – TAIYO, Japan**
- **Automatic Viscosity Control System – VISCON GLOBAL, Japan**
- **Stroboscope System – POKAI, Taiwan**



WEB + ACCESSORIES

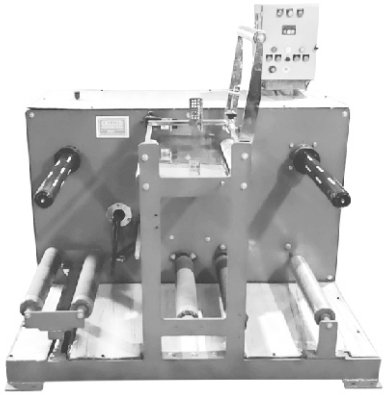
UNWINDER TRACKER



PIVOT TRACKER

AIR SHAFT

S.R.A. TRACKER



REWINDING MACHINE - CANTILEVER

At Deluxe Engineering Works, we have developed such a team of experts, which is highly tactful and competent in guiding any web/film, from the thinnest plastic films to heavy-duty foil/steel strips, from tape films to widest papers, leather, etc.

SUITABLE FOR - Rotogravure / Flexographic / Slitting / Lamination / Tape Coating Machines

**A – 162, Sector A4,
Trans Delhi Signature City,
Loni, Ghaziabad, U.P. – 201102**

**Dinesh Trivedi
Ayush Trivedi**

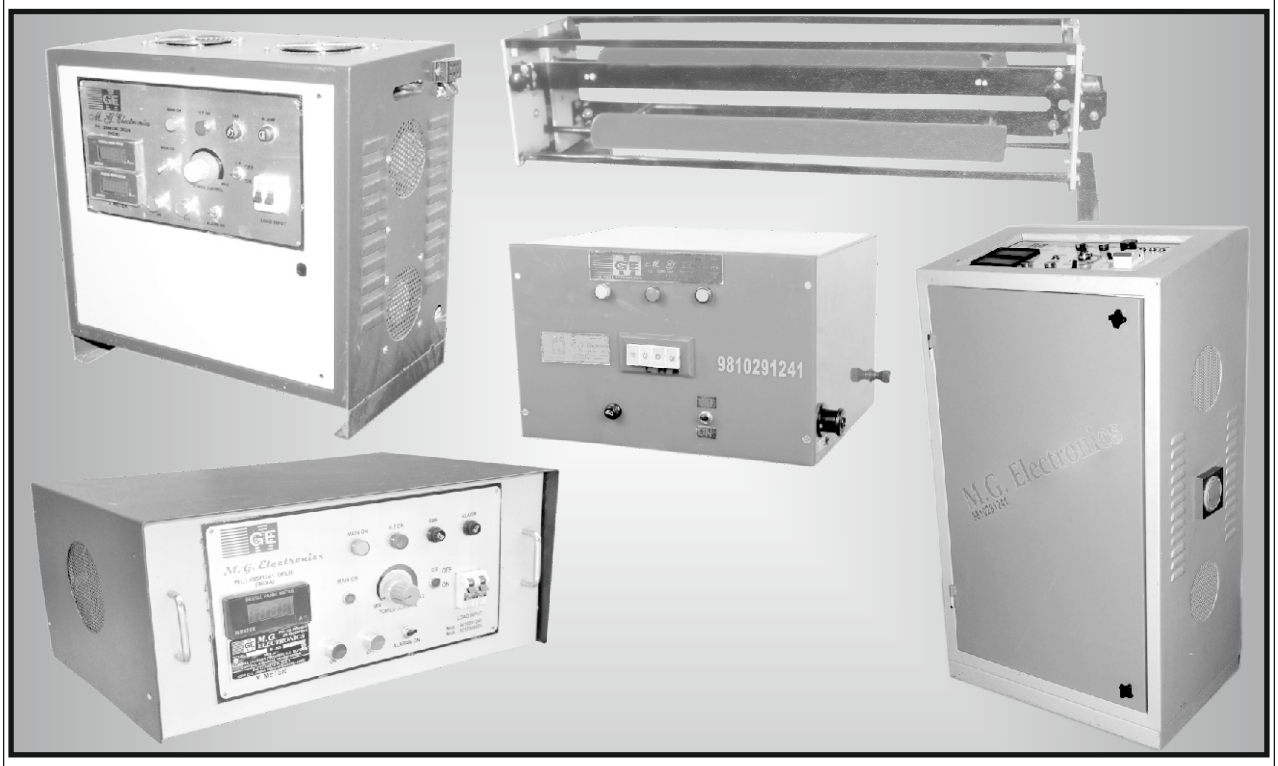
**+91 98681 27640
+91 93138 30506**

deluxeenggworks@gmail.com

M.G. ELECTRONICS

MANUFACTURERS & SUPPLIER OF :

(3-D) I.G. B.T. CORONA TREATER, FULLY SOLID STATE, AC CONTROL, STATIC CHARGE, SERVO TRANSFORMERS, DC MOTOR & CONTROLS



FEATURES :

Suitable for P.P., L.D., H.M., L.L.D.P., P.O.P.P., H.D.P.P., Corrugated Sheet, Non Woven Fabrics, Glass Tube and PVC Pipe, Metalized Setas. Water Fabric & Sacks

- ★ Power Saving & Highly Efficient
- ★ Spark Protection System
- ★ Key System Frame with High Quality Silicon Roller
- ★ Non Disturbance from Waves [of TV, Radio and Other Frequencies]
- ★ Maximum Operator Safety
- ★ Auto Digital Indicators Provided
- ★ Power Resisting Treaters
- ★ The Total Treater Requirement is **1 AMP**
- ★ Also Manufacturing High Quality Velvett Charging Machine

Quality and Promt Service is our Motto

FACTORY:

D-1, BASEMENT, CHANAKYA PLACE-I (40-FEET ROAD) OPP. C-I JANAKPURI, NEW DELHI-110059 PHONE : 25635674, 25033862

MOBILE : 9810291241, 9212308035

E-mail : mgelectronicsdelhi@gmail.com Website : www.mgelectronicsdelhi.com

Massive generation of waste and its management

We are the most populous nation in the world, population 140 crores. Naturally it means commensurate waste generation will be there; a conservative estimate is about 180,000 M Tons per day. Its collection and further processing naturally pose a huge challenge to the authorities. Out of this Delhi generates around 11500 M Tons per day. The municipal authorities face a daily challenge in collecting and processing this.

Delhi currently operates four waste-to-energy (WTE) plants with a combined capacity of about 7,300 metric tons per day. Plans are underway for a fifth plant with a capacity of 3,000 metric tons per day. The existing plants generate about 85 MT electricity per day, and further capacity expansion is being planned.

There are many problems with the running processing plants. Mixed and wet waste, the combustion thereof, causes toxic gases (results in emission of) and fumes. The residents near these plants continuously complain of burning sensation and ever spreading ash and fumes. All in all, they pose a big health hazard. The Hon'ble Supreme Court is at present seized with the matter.

The norms and regulations for their operation are strict and comprehensive, the problem is their enforcement and implementation. And further, to process this quantity the authorities have no other viable option.

In the above context, plastic waste is about 8% of the total MSW. If the authorities segregate the collected waste, much value can be recovered in the form of recyclables, including plastic. Plastic waste is and was never a problem as far environment is concerned. If collected and segregated then very good value can be easily recovered. Whatever is left helps in the incineration.

To manage this quantum of waste there has to be a strong will on part of the both the state and the central governments to take stern action against persons/establishments who do not follow the norms and the directions. Beijing used to be the most polluted city in the world and because of strong will and corrective actions it has now dropped much lower down on the table of polluted cities. Now Delhi and Lahore have this dubious distinction.

ASSOCIATION ACTIVITIES

Letter dated 23rd November, 2024 sent to the Chairman, Delhi Electricity Regulatory Commission, requesting for uploading Udyog/Udyam Registration instead of the Factory License for Micro & Small Industries

"We are one of the largest associations of Micro and Small-Scale Plastic Processors in the country, dedicated to serving the interests of MSMEs since 1982.

This letter concerns the current requirement for micro and small industries to upload their factory license on your website by March 15, every year, to avoid increased tariffs (from ¹ 7.75/unit to ¹ 8.50/unit).

On behalf of micro and small industries in Delhi, we submit that the Udyam/Udyog registration certificate, issued by the requisite authority, is a more comprehensive document than the factory license and this should suffice for the above purpose. Moreover, there will be no need of annual uploading.

We therefore request you to please substitute Udyam/Udyog Registration certificate instead of the factory license.

We kindly request your response to this matter".

Important points discussed in the Monthly Executive Committee Meeting held on 11th November, 2024

1. **To approve the minutes of previous Executive Committee Meetings held on 10th October, 2024.**
   Minutes of the Executive Committee meeting held on 10th October, 2024 were considered and approved.

2. **Approval of the Expenditure for the Month of September 2024**
   The expenses for October, 2024 were reviewed and approved.

3. **Discussion on Industry-Related Matters**
   Shri Ravi Kumar Aggarwal, Patron, informed the committee about the upcoming **fifth session of the Intergovernmental Negotiating Committee (INC-5)** to develop a Global Plastics Treaty, scheduled from November 25 to December 1, 2024, in Busan, South Korea. This treaty aims to reduce global plastic pollution by enforcing binding regulations for signatory nations. Unfortunately, EPR is supported worldwide.

   Therefore, the Ministry of MSME requested our stance in this regard. He shared India's perspective, highlighting: India's plastic consumption is 12 kg per capita compared to the global average of 30 kg per capita and more than 100 kg per capita in developed nations. In our country, the problem is collection. Plastic waste constitutes about 8% of municipal solid waste, with collection being a major challenge in India.

   The association submitted its comments to the Ministry of MSME, emphasizing that the focus should be on improving waste collection mechanisms in India rather than imposing strict producer-level compliance measures like EPR. These inputs were reproduced in the November issue of the monthly journal, *Plastic World*.

   Shri Bhupesh Ralli raised concerns about:

- Additional charges on electricity bills, including PPAC and Pension Trust Surcharges. Shri Ravi Kumar Aggarwal informed that about the additional charges and sur-charges in electricity bills we have been writing to them for the past more than 5 years but to no effect.
- An unexplained increase in tariffs for MSME units in Delhi.
- The current requirement for micro and small industries to upload their factory license by March 15, every year, to avoid increased tariffs **(from Rs 7.75/unit to Rs 8.50/unit).**

  He further said that industries with MSME Udyam Registration Certificates should not be required to upload factory licenses. The committee agreed to write to the concerned authorities requesting to substitute Udyog/Udyam Registration Certificate for micro and small units instead of Factory License.

5. Discussion on the AIPIA's **conference/seminar/exhibition** under **Ministry of MSME guidelines**
   As proposed by Shri Ravi Kumar Aggarwal, Patron some time back that an exhibition must be organized in 2025. It was decided to form a committee to plan and execute the event.

6. **Any Other Matter for Discussion, Subject to the Chair's Approval**

- **Support & Participation in Upcoming Exhibitions**
  The association agreed to support and participate in the following exhibitions:

• Plast Asia 2025 (9-12 May 2025: Bangalore) • Indusfood Manufacturing 2025 (9-11 January 2025: Yashobhoomi Dwarka) • Food & Beverage Expo 2024 (18-20 December: Chennai)

Key actions included:

- Promoting these exhibitions on AIPIA's official website.
- Disseminating details via email and WhatsApp to members.

Article 1

PPRC 2024: Addressing the packaging recovery problem

By: Tess Kazdin, Editor-Waste Today

Panelists at this year's Paper and Plastics Recycling Conference discussed challenges in residential packaging recovery and methods for improvement.

It's no secret that when it comes to household-generated paper and plastics recycling, the U.S. has a recovery problem. Recent reports, including those published by The Recycling Partnership (TRP) and the U.S. Department of Energy's National Renewable Energy Laboratory (NREL), have revealed gaps in packaging recovery, highlighting missed economic opportunity and room for improvement across all material types.

At this year's Paper and Plastics Recycling Conference (PPRC), which took place Oct. 23-24 in Chicago, speakers at the "Do We Have a Recovery Problem?" session echoed this sentiment and answered the question with a resounding "yes."

The session's speakers included Myles Cohen, founder of Circular Ventures LLC and a board member at Switzerland-based Vipa Group; Anelia Milbrandt, senior research analyst at NREL's Strategic Energy Analysis Center; Scott Mouw, senior director of strategy and research at TRP; and Johnny Gold, president of the Gold Group and paper specialist at Davis Index.

Residential recycling accounts for an estimated 8 percent of all recycled materials, according to data presented by the speakers.

"A lot of money gets thrown at household recycling, but 92 percent of what we recycle in this country comes from industrial, commercial, institutional and retail," Cohen said. "[About] 5.8 million tons of over 40 million tons of paper… comes from residential."

Within these streams, paper accounts for an estimated 50-65 percent of material.

Despite funding mechanisms investing millions of dollars in residential recycling, the number of tons recycled over the last 10-15 years for many cities is either flat or down, Cohen said, citing collection and processing costs as hindrances.

Cities collect approximately 3-6 pounds of recyclables per household per week compared with an estimated $300- to $450-per-ton collection cost. One city pays as much as $690-per-ton for curbside collection, Cohen said.

"We're driving these $300,000 trucks around neighborhoods and we're picking up 3 pounds at a time," he added. "We're collecting material that is worth about $100-a-ton, and it's costing us $350-, $400-, $450-, $500-, $600- and, in one case, almost $700-a-ton to collect it, plus the processing cost on top of it."

Cohen and Mouw confirmed that a $90-per-ton processing fee is low for single-stream recycling, and a $125 fee is more common.

The cost of collection and processing, high contamination rates and gaps in recycling access and education are factors that have played a role in the amount of packaging materials lost to landfills annually.

Missed opportunities

Recent data have revealed more paper products are landfilled than previously thought.

According to a report published by NREL in December 2023 comprised of data from 2019, paper in U.S. landfills represents $4 billion in lost economic value, while plastic represents $7.2 billion.

The lab surveyed more than 1,700 landfills and 85 combustion facilities and reviewed 52 waste composition studies by material type at the state, county and local levels. It found that paper and cardboard are the largest municipal solid waste (MSW) categories generated and, together, paper and plastic represented approximately 40 percent, or approximately 186 million tons, of MSW managed in the U.S. in 2019.

Of those 186 million tons, an estimated 68 million tons of paper products and 40 million tons of plastic were landfilled that year.

NREL's findings show 38 percent of discarded paper and cardboard is recycled, while 6 percent is combusted and 56 percent goes to landfills.

Milbrandt highlighted the potential for compostable paper products, such as paper towels, napkins and soiled pizza boxes, to be converted to energy through aerobic and anaerobic digestion and other waste-to-energy (WTE) processes, as the report reveals that compostable paper is landfilled at a rate of 90 percent.

"We are missing a great opportunity to reclaim the energy that's being used to produce this material," she said of all landfilled packaging.

The NREL report, which focused on landfilled paper products, analyzed material nationally and regionally—Pacific, Rocky Mountain, Midwest, Southwest, Southeast and Northeast.

Overall, the Southeast had the highest percentage of paper and cardboard landfilled from MSW at about 25 percent, while the Pacific had the lowest at about 17 percent.

The financial impact of landfilled paper and plastic is not insignificant. Together, landfilled packaging represents $11 billion in lost market value, plus $6 billion in disposal costs.

Plastic's recovery rate comes as no surprise to Milbrandt.

"We've known that the rates have been low, but [this] highlights the need and the opportunities for improvement," she said. "Based on our research, recycling rates [for paper and cardboard] are lower than we thought before."

The state of residential recycling

Gaps in residential recycling accessibility, education and participation have exacerbated the recovery problem.

A report by Washington-based TRP titled "State of Recycling: Present and Future of Residential Recycling in the U.S.," reveals only 21 percent of 47 million tons of residential recyclables are recycled annually, while 76 percent are trashed at the household level and 3 percent are lost at material recovery facilities (MRFs).

"We have done a lot of studies very specific to households and their recycling behavior, and we know that even the people who recycle don't recycle everything," Mouw said. "They recycle about two-thirds of their recyclables."

Forty-three percent of households participate in recycling, and nonparticipation is due to both lack of access and insufficient communication and outreach, Mouw explained. Approximately 7 million single-family households in the U.S. do not have access to recycling services, and the number is even bigger for multifamily properties; approximately 19.5 million multifamily households are without equitable access to recycling, meaning on-property access.

Mouw highlighted five key factors impacting residential recovery: recycling access, material acceptance, participation rate, participation capture rate and MRF capture rate.

"Three percent of the loss [in recyclables] comes from MRFs not operating at 100 percent efficiency," he said. "If every commodity that came in the front door went out the back as a commodity, that 3 percent would disappear and it would be a nonfactor."

Variation in accepted materials lists by location influences the types of materials lost as well.

"If we all compared, you'd have different collection lists specific to you by your municipality," Mouw said. "It drives us all crazy, there's not one standard list."

Old corrugated containers (OCC) are the most widely accepted packaging material across the U.S., boasting a 90 percent national acceptance rate. PET bottles and high-density polyethylene (HDPE) bottles are at 89 percent, mixed paper is at 88 percent and PET thermoforms are at 54 percent, while polyethylene (PE) film has only a 3 percent acceptance rate, according to data Mouw presented.

Of all the commodities, TRP's research indicates cardboard has the highest residential recycling rate: 32 percent.

"To succeed beyond that, [cardboard] needs better access overall … and for folks to participate better," Mouw said. "Each commodity has different challenges."

In Mouw's perfect system—with 100 percent access to recycling, where all commodities can be recycled, 9 out of 10 households participate by putting at least 80 percent of recyclables in the bin every collection cycle and MRFs only lose 5 percent of materials—TRP determines a 68 percent national recycling rate can be achieved.

"Each one of those things would have to be improved," Mouw explained. "We think they can be improved in a policy environment under EPR [extended producer responsibility]."

Making improvements

EPR has been one of the key solutions proposed to improve packaging recovery rates.

Under EPR in Oregon, legislators are attempting to boost recovery by setting standard MRF capture rates for different commodities. While some of Oregon's proposed capture rates only see 1-2 percent increases over a three-year period—OCC would go from 96 percent to 97 percent, for example—other commodities would see steeper increases. HDPE bottles and containers would go from an 88 percent proposed capture rate in July 2025 to 95 percent in January 2028.

Producer responsibility organizations (PROs) are required to improve MRF processing in Oregon through funding, which, according to Mouw, should allow them to meet their targets.

"It's an important moment that a state is now regulating how efficient MRFs are," he said.

Cohen highlighted another proposed solution; mixed waste processing, also known as dirty MRFs or the one bin system, which would combine recycling and refuse bins to make recycling and disposal easier for residents.

"I don't think that's viable," Gold said. "Paper mills are in the business to make money. They compete on a daily basis … against virgin [material]. You must have clean secondary fiber recovery, [and] it's been difficult enough with single-stream."

"We have to adjust contamination on the front end," Mouw added, echoing Gold's doubts about mixed waste processing. "We have to address the efficiency of MRFs, and maybe that's a little bit more costly than mixed waste processing, but you're not going to get the quality or the quantity of the material."

Another way to improve overall packaging recovery, including IC&I packaging, is to shift funding to include small commercial operations as well. While big box stores and shopping malls generate revenue from recycling and tend to have higher recovery rates, Cohen suggested developing funding for small businesses to improve recycling.

"If you're a small restaurant, a small shopping center, you're going to have a garbage dumpster in the back," Mouw said. "But if you want to recycle, … it's a marginal cost to your business, just like it's a marginal cost for communities to have curbside recycling in addition to garbage."

Under EPR in Colorado, the state plans to close the gap on small commercial collection between 2030-2035, which will be made possible through funding from PROs. By alleviating the high-margin cost decision from the small business or community, the barrier preventing the recovery of more material is removed.

"This is why EPR is important," Mouw said. "It switches the financing to the products we actually consume and brings that financing forward to improve the system."

(Source: Waste Today; 5th November, 2024)

Article 2

How carbon credits work in the context of recycling

-By Surbhi Jore

When a company engages in recycling activities, it can potentially earn carbon credits for the emissions reductions it achieves.

Carbon credits are a key mechanism in the global fight against climate change, providing financial incentives for reducing greenhouse gas (GHG) emissions. In the context of recycling, carbon credits work by recognizing the emissions reductions that occur when recyclable materials are diverted from landfills, processed, and reintroduced into the production cycle. The recycling process typically requires less energy compared to manufacturing products from virgin materials, thus reducing GHG emissions.

When a company engages in recycling activities, it can potentially earn carbon credits for the emissions reductions it achieves. These credits can then be sold on carbon markets to organisations or countries looking to offset their own emissions. Each carbon credit represents one metric tonne of carbon dioxide (CO2) or its equivalent in other GHGs that have been avoided or removed from the atmosphere.

The role of recycling in reducing carbon emissions

Recycling plays a crucial role in carbon reduction for several reasons:

Energy savings: Recycling materials like metals, plastics, and paper generally consumes far less energy than producing these materials from raw, virgin resources. Since energy production is a major source of GHG emissions, using recycled materials can significantly reduce the carbon footprint.

Reduced landfill emissions: When waste materials, particularly organic and plastic waste, are sent to landfills, they decompose and release methane—a potent greenhouse gas. Diverting materials from landfills to recycling reduces the volume of methane emissions, thus contributing to carbon reduction efforts.

Circular economy: Recycling supports the circular economy by keeping materials in use for as long as possible, reducing the need for new resource extraction. The fewer raw materials that are mined or extracted, the lower the associated GHG emissions.

Current prospects for carbon credits in recycling

The prospects for earning carbon credits from recycling activities are growing, driven by increasing global awareness of the need to reduce emissions and the expanding carbon credit markets. Some of the key trends and developments include:

Market growth: The voluntary carbon market is expected to grow significantly, driven by corporate net-zero commitments and governmental policies. Companies looking to offset their emissions are turning to carbon credits as a way to meet their climate goals, which provides an opportunity for recycling companies to monetize their emissions reductions.

Corporate demand: Corporations are increasingly looking for ways to offset their carbon footprints, with many setting aggressive sustainability targets. Recycling companies that can quantify and certify their emissions reductions can sell carbon credits to these organizations, creating a new revenue stream.

Government incentives: Many governments are introducing policies and regulations that promote recycling as a way to achieve national carbon reduction targets. These policies may include financial incentives or subsidies for recycling companies that help reduce GHG emissions.

Technological advances: Advances in technology, such as blockchain, are helping to improve transparency and traceability in the recycling industry, making it easier to verify emissions reductions and generate carbon credits.

Regulatory requirements for carbon credits from recycling

To generate carbon credits from recycling activities, companies must meet specific regulatory requirements that ensure the integrity and transparency of the emissions reductions. Some of the key requirements include:

Companies must have their emissions reductions verified by third-party auditors. This ensures that the claimed carbon reductions are real, measurable, and additional (i.e., they would not have occurred without the recycling activity). Verified carbon credits can then be issued by accredited bodies such as Verra or Gold Standard.

Recycling companies must register their projects with carbon credit registries that oversee the issuance of carbon credits. These registries ensure that projects comply with international standards and provide a marketplace for trading credits.

Carbon credits must comply with standards such as the Clean Development Mechanism (CDM) under the Kyoto Protocol or voluntary standards like Verra's Verified Carbon Standard (VCS). These standards define the methodologies for calculating emissions reductions from recycling activities.

Recycling companies need to use specific methodologies to calculate the emissions reductions from their activities. For example, methodologies may involve calculating the amount of emissions avoided by recycling materials instead of producing them from virgin resources, as well as any energy savings realized.

Future impacts of carbon credits in recycling

The future of carbon credits in recycling is promising, as the world intensifies efforts to combat climate change. Some of the potential impacts include:

As more companies recognise the financial value of carbon credits, there may be increased investment in recycling infrastructure and technologies, particularly in developing countries where waste management systems are less developed.

Carbon credits will help drive the adoption of circular economy principles, as businesses seek to reduce emissions by reusing and recycling materials rather than relying on new resource extraction.

The ability to generate and sell carbon credits could provide a significant new revenue stream for recycling companies, helping them to grow and scale their operations.

As governments around the world implement stricter carbon regulations, recycling will likely become a key strategy for meeting emissions reduction targets. This could lead to further integration of carbon credits into national and international climate policies.

RecyclX by asm, as a traceability platform, plays a critical role in helping recycling companies generate carbon credits by ensuring transparency, accurate data collection, and verifiable emissions reductions. RecyclX tracks the entire lifecycle of recycled materials, from collection to reprocessing, ensuring that all activities are accurately documented. This traceability is essential for verifying emissions reductions and generating carbon credits.

It collects real-time data on recycling activities, uses a blockchain-based ledger to ensure that all transactions and data are secure, transparent, and immutable. It provides digital product passports that prove the sustainability of the materials and provide evidence needed for carbon credit verification.

(Source: Waste & Recycling)

Article 3

At treaty negotiations in Busan, India proposes compensation to meet costs of controlling plastics

Developing countries will only comply with 'control measures' on plastic if they are compensated for the cost they entail, India said in a proposal at the Global Plastics Treaty negotiations on Wednesday (November 27, 2024). This is India's first substantive move during the talks being held at the South Korean city of Busan.

Echoing a principle from climate change negotiations, India has also emphasised that there must be a transfer of technologies from developed to developing nations that must respect "national circumstances."

Exactly what these 'control measures' and 'costs' are has not been specified yet. They are among a plethora of crucial undefined terms; in fact, there is still no agreed definition for the word 'plastic' as far as the treaty is concerned. These and many other concepts are at the heart of the negotiations, involving around 170 countries.

Officially called the 5th Intergovernmental Negotiations Committee (INC), which is administered by the United Nations Environment Programme (UNEP), the talks are schedule to conclude on December 1.

More ambitiously, the treaty aims at having countries cut the production of plastic itself and as a consequence, plastic polymers, which are components of most products undergirding modern economies.

India has a significant petrochemicals refining industry and while it has banned several kinds of single-use plastic, it has been far from successful at reining in plastic waste.

Solo proposal

Several other countries have articulated proposals regarding finance mechanisms. However, India is among the few that have gone solo in making sub-missions.

'A just transition'

In verbal 'interventions', where countries publicly raise their concerns to the INC Chair, the tenor of India's submissions is that speed ought not to trump the spirit of consensus, inclusivity, and transparency. While many countries have addressed various proposals in the several contact groups, India has so far restricted itself to formal proposals on finance mechanisms.

India has also proposed that a new dedicated multilateral fund be created with contributions to be "additional and distinct" from other financial transfers. This fund would be governed by a duly constituted subsidiary body that will also facilitate "...transfer of technology from developed countries to developing countries, for achieving a just transition towards sustainable production and consumption of plastics, in accordance with national circumstances under the financial mechanism," India's submission added.

Worried countries

While national representatives at these talks are in principle committed to an agreement, many are worried that a treaty on plastic pollution will restrict the production and supply of plastic and polymers, disrupting their economies. On the other end of the spectrum are Pacific island nations such as Tuvalu, Palau, and Fiji, who are demanding ambitious action on restraining both plastic waste and production. They point out that the marine pollution from dumping plastic waste as well as their limited capacity to respond has resulted in existential threats to their countries.

News Concerning Plastics

India, Russia Raise WTO Concerns Over Plastic Trade Rules

India and Russia have expressed concerns about potential conflicts between future global rules on plastic trade and WTO norms, highlighting the impact on plastic exports.

New Delhi, Nov 20 (PTI) India has joined Russia to raise a concern regarding potential conflicts between future global rules on trade in plastics products and WTO norms, an official said on Wednesday.

The issue was flagged by Russia during a meeting of a WTO (World Trade Organisation) Committee on Market Access on November 19-20.

Russia has raised concerns regarding potential conflict between future rules on trade in plastics products and WTO rules.

According to Moscow, an upcoming meeting of the UN's Intergovernmental Negotiating Committee (INC) on Plastic Pollution in Busan, Korea, will consider attempts by some countries to adopt provisions aimed at establishing limits of production, trade and consumption of all kinds of plastics.

It has stated that if such a scenario unfolds, fundamental WTO rules such as bound tariffs, national treatment, most-favoured nation treatment, the prohibition of quantitative restrictions, as well as technical barriers to trade (TBT) and sanitary and phytosanitary (SPS) rules may no longer apply to trade in plastic materials.

"Saudi Arabia and India echoed the concerns raised by Russia," a Geneva-based official said.

India is a key player in plastic exports. The shipments rose 14.37 per cent to USD 5.21 billion during April-October this fiscal year.

Further during the meeting, Indonesia raised issues with regard to quality control orders issued by India on a number of products, including medical textiles, viscose staple fibres, and footwear made from leather and other materials.

Thailand has flagged concerns on measures that may have unintended results equivalent to quantitative restrictions on the import of copper, wooden boards, and tyres.

(Source: PTI 20-11-2024)

Driving sustainable growth: Innovations and strategies for the FMCG industry

A revolution is brewing in the FMCG industry, which is fuelled by technological upheaval, shifting consumer values, and innovative business models. The rise of e-commerce and quick commerce is redefining shopping habits, while innovative business models disrupt traditional norms. Amidst this transformative landscape, organizations must stay attuned to the dynamic forces reshaping the industry, including emerging consumer segments, shifting usage patterns, and latent need gaps. As the sector navigates this unprecedented change, understanding the implications and opportunities presented by these shifts is crucial for sustained growth and competitiveness.

Packaging for the Future

The packaging paradigm has undergone a significant transformation, as the FMCG industry adapts to the diverse needs of a rapidly evolving consumer landscape. Emerging demographics, such as the elderly, single-person households, time starved hustlers, conscious consumers, and tech-savvy individuals, are driving demand for tailored packaging. Key trends include easy-opening solutions for seniors, smaller portion sizes and resealable packaging for singles, convenient and portable packaging for on-the-go consumption, and sustainable products

with eco-friendly packaging. Notably, consumers are willing to pay a 10% premium for sustainable options. The role of packaging has evolved beyond containment and protection, now shaping experiences, perceptions, and environmental impact. The unboxing experience, packaging materials like corrugated boards, flexible plastics, and integration of technology such as QR codes enable informed consumer choices, authenticity verification, and virtual trials. As online shopping continues to rise, the demand for safe, convenient, and tech-enabled packaging solutions will increase, prompting a transformation in the packaging landscape that prioritizes experience, sustainability, and innovation.

Technological Innovations Powered by AI

AI is catalyzing a seismic shift in the FMCG industry, transforming business models, and reimagining customer experiences. This technology is being leveraged to replace manual, non-value-added tasks with automated processes, thereby improving overall system efficiencies. AI's impact extends to targeted selling, enabling companies to tailor their offerings to specific customer segments. Moreover, AI facilitates the development of differentiated, personalized packaging solutions in limited timeframes and quantities, catering to diverse consumer preferences. As AI continues to permeate the FMCG landscape, consumers can expect enhanced experiences, improved product offerings, and increased value.

Sustainability principles

Changes in consumption patterns by consumers has led to substantial increase in number of products and packs consumed by individual consumers. This has led to one of the greatest challenges that industry faces today, which is driving sustainability. Sustainability in packaging is no longer a buzzword; it is an urgent necessity. The impact of packaging waste on our ecosystems, public health, and economy cannot be overstated. The environmental degradation caused by non-recyclable materials is a crisis that demands immediate action.

Innovations in FMCG today, must focus on driving sustainable solutions. Global food and consumer goods production accounts for 60% of greenhouse gas (GHG) emissions, 80% of water usage, and 66% of tropical forest loss. Sustainability will be an increasing concern with changing expectations of regulators, consumers and the employees.

The current trajectory of packaging waste generation is unsustainable. The packaging industry is at a crossroads, and the choices we make today will determine the future of both the industry and the environment.

The New Frontier for India's Consumer Goods Sector

As sustainability takes centre stage in India's consumer goods sector, pioneering companies are revolutionizing packaging solutions to minimize environmental impact. However, the country also faces challenges such as its vast population, diverse markets, and inadequate waste management infrastructure. Companies like Marico are already making strides, with 95% of its portfolio being recyclable and significant reductions in plastic usage achieved through innovative packaging solutions. The key to success lies in embracing the principles of circular economy, zero emissions, and the tenets of Reduce, Replace, and Reuse. This includes transitioning to eco-friendly materials, reducing packaging material without compromising product integrity, and emphasizing reuse and recycling. By adopting sustainable packaging solutions, businesses can mitigate environmental damage while seizing opportunities for innovation, competitiveness, and long-term economic growth. Effective collaboration, policy interventions, and cutting-edge technologies will be crucial in overcoming the challenges and unlocking India's potential for sustainable packaging excellence.

A Collective Commitment to Sustainability

To summarise, innovation and collaboration is at the heart of sustainable growth for the FMCG industry. Indian startups and companies are already pioneering new products and technologies that can redefine the future of FMCG industry. The Indian packaging industry must invest in research and development to scale these

innovations and make them commercially viable. By fostering a culture of innovation and investing in sustainable materials, companies can reduce their dependence on non-renewable resources while meeting the needs of environmentally conscious consumers.

No single entity can achieve sustainability in packaging alone. It requires collaboration across the entire value chain— from material suppliers and manufacturers to retailers, consumers, and waste management authorities. The FMCG industry's future hinges on innovation and collaboration. Indian pioneers are revolutionizing sustainable packaging, harnessing natural sources to reduce waste and fuel economic growth. To scale, industry leaders must invest in R&D, foster a culture of innovation, and adopt eco-friendly materials. Collective action across the value chain – suppliers, manufacturers, retailers, consumers, and waste managers – is crucial. Together, we can create a sustainable packaging ecosystem, driving growth, and protecting the planet for generations to come.

The packaging industry stands at a crossroads, poised to revolutionize its impact on the environment. To achieve this transformative shift, industry leaders, policymakers, and citizens must unite to establish a sustainable packaging ecosystem that balances profitability with planetary well-being. By investing in eco-friendly materials, fostering collaboration, and leveraging heritage practices, we can transform the industry into a force for good. Collective action is imperative to reduce waste, promote sustainable packaging solutions, and support a thriving circular economy. Together, we can shape a brighter future, safeguarding the environment while driving economic progress. The time for action is now – let us join forces to package a better world.

(Source: The Times of India, Nov 8, 2024)

'Easy, convenient, cheap': how single-use plastic rules the world

Bangkok: Each year the world produces around 400 million tonnes of plastic waste, much of it discarded after just a few minutes of use. Negotiators hope to reach the world's first treaty on plastic pollution this year, but across five very different countries, AFP found single-use plastic remains hugely popular as a cheap and convenient choice, illustrating the challenges ahead:

On a Bangkok street lined with food vendors, customers line up for Maliwan's famed traditional sweets.

Steamed layer cakes — green with pandan leaf or blue with butterfly pea — sit in clear plastic bags alongside rows of taro pudding in plastic boxes.

Each day, the 40-year-old business uses at least two kilos of single-use plastic. "Plastic is easy, convenient and cheap," said 44-year-old owner Watchararas Tamrongpattarakit. Banana leaves used to be standard, but they are increasingly expensive and hard to source. They are also onerous to use because each one must be cleaned and checked for tears. It "isn't practical for our pace of sales", said Watchararas. Thailand started limiting single-use plastic before the pandemic, asking major retailers to stop handing out bags for free.

Thailand produces two million tons of plastic waste a year, according to the country's Pollution Control Department. The World Bank estimates 11 percent goes uncollected, and is burned, disposed of on land or leaks into rivers and the ocean. Watchararas tries to consolidate purchases into fewer bags and said some customers bring their own reusable containers and totes. But Radeerut Sakulpongpaisal, a Maliwan customer for 30 years, said she finds plastic "convenient". "I also understand the environmental impact," the bank worker said. But "it's probably easier for both the shop and the customers".

Lagos

In the Obalende market at the heart of Nigeria's economic capital Lagos, emptied water sachets litter the ground. Each day, Lisebeth Ajayi watches dozens of customers use their teeth to tear open the bags of "pure water" and drink. "They don't have the money to buy the bottle water, that's why they do the pure water,"

said the 58-year-old, who sells bottles and bags of water, soap and sponges. Two 500-millilitre sachets sell for between 50 to 250 naira (3-15 US cents), compared to 250-300 naira for a 750-ml bottle. Since they appeared in the 1990s, water sachets have become a major pollutant across much of Africa, but they remain popular for drinking, cooking and even washing.

Some 200 rms produce the sachets in Lagos, and several hundred more recycle plastic, but supply vastly outstrips capacity in a country with few public wastebins and little environmental education. Lagos banned single-use plastic in January, but with little impact so far. The United Nations estimates up to 60 million water sachets are discarded across Nigeria every day.

Rio

Each day, vendors walk the sands of some of Rio de Janeiro's most beautiful beaches, lugging metal containers lled with the tea-like drink mate. The iced beverage, infused with fruit juice, is dispensed into plastic cups for eager sun worshippers dotted along the seafront. "Drinking mate is part of Rio de Janeiro's culture," explained Arthur Jorge da Silva, 47, as he scouted for customers. He acknowledged the environmental impacts of his towers of plastic cups, in a country ranked the fourth-biggest producer of plastic waste in 2019. But "it's complicated" to find affordable alternatives, he told AFP. The tanned salesman said mate vendors on the beach had used plastic for as long as he could remember. He pays a dollar for a tower of 20 cups and charges customers $1.80 for each drink.

Bins along Rio's beaches receive about 130 tons of waste a day, but plastic is not separated, and just three percent of Brazil's waste is recycled annually. Evelyn Talavera, 24, said she does her best to clean up when leaving the beach. "We have to take care of our planet, throw the garbage away, keep the environment clean." Plastic straws have been banned in Rio's restaurants and bars since 2018, and shops are no longer required to offer free plastic bags — though many still do. Congress is also considering legislation that would ban all single-use plastic.

Paris

In France, single-use plastic has been banned since 2016, but while items like straws and plastic cutlery have disappeared, plastic bags remain stubbornly common. At Paris' Aligre market, stalls are piled with fruit, vegetables and stacks of bags ready to be handed out. Most are stamped "reusable and 100-percent recyclable", and some are described as compostable or produced from natural materials. But experts have cast doubt on the environmental relevance of some of these claims.

Vendor Laurent Benacer gets through a 24-euro ($26) box of 2,000 bags each week. "In Paris, everyone asks for a bag," he told AFP. "I'd stopped, but my neighbours continued, so I had to restart." There are alternatives like paper bags, but some customers are simply not convinced. "Plastic bags remain practical, so everything doesn't spill everywhere," insisted 80-year-old customer Catherine Sale.

Dubai

At the Allo Beirut restaurant in Dubai, plastic containers are piled high, waiting to be filled and delivered across the city. "We receive more than 1,200 orders a day," said delivery manager Mohammed Chanane. "We use plastic boxes because they are more airtight, and better preserve the food," he said. With few pedestrians and an often-scorching climate, many of Dubai's 3.7 million residents rely on delivery for everything from petrol to coee. Residents of the United Arab Emirates have one of the highest volumes of waste per capita in the world. And single-use plastic accounts for 40 percent of all plastic used in the country. Since June, single-use plastic bags and several similar items have been banned. Polystyrene containers will follow next year. Allo Beirut is considering using cardboard containers, a move customer Youmna Asmar would welcome. She admitted horror at the build-up of plastic in her bins after a weekend of family orders. "I say to myself, if all of us are doing this, it's a lot."

(Source: The Economic Times, 25th November, 2024)

After climate talks, countries gather for COP to end plastic

Were the Busan negotiations to prove successful, next year will see a diplomatic convention where Ministers from signatory countries will likely adopt the text and set the ground for meetings to evolve a legally binding treaty to progressively weed out plastic

The exhaust from the planes that ferried ministerial delegates to Baku for the climate conference, which concluded on Sunday (November 24, 2024), has barely settled. Yet some of them found themselves on the red-eye to this coastal city to lay the foundations of a new United Nations-mediated treaty to end plastic pollution – and potentially the production of plastic.

On December 1, representatives from 175 countries would hope that this fifth and anticipated final round of discussions of the Intergovernmental Negotiations Committee (INC), following those in Punte Del Este (Uruguay), Paris (France), Nairobi (Kenya) and Ottawa (Canada), will result in an agreement.

Were the Busan negotiations to prove successful, next year will see a diplomatic convention where Ministers from signatory countries (parties) will likely adopt the text and set the ground for periodic meetings – akin to the annual climate Conference of Parties (COP) – to evolve a legally binding treaty to progressively weed out plastic.

For comparison, the United Nations Framework Convention on Climate Change – the guiding climate change tackling agreement – was adopted in 1992 and entered into force in 1994. The first COP was held in Berlin in 1995.

"The historic Paris Agreement of 2015 where the world finally agreed to limit emissions to keep temperatures from breaching 2 degree Celsius took 21 Conference of Parties meetings. We cannot wait for 21 years to end plastic," said Inger Andersen, Executive Director, United Nations Environmental Programme (UNEP) at a press conference on Monday (November 25, 2024).

In March 2022, in Nairobi, the United Nations Environmental Agency (UNEP's governing body) passed a resolution to "end plastic pollution, including in the marine environment".

While there is global consensus that plastic pollution is a problem, and several countries are enthusiastic about ways and means to encourage recycling and prohibiting certain plastics that lead to littering – India for instance has banned single-use plastic since 2022 – many of them prefer to drag their feet on actually limiting plastic production. Many of these countries are either petro-states or those that have significant industries that manufacture plastic polymers.

Negotiations in the week ahead will centre around a 'non-paper', a document put forward by the INC Chair Luis Vayas Valdivieso, that serves as a synthesis of the common ground that countries have seemingly achieved in the previous negotiations since 2022.

Representatives from India, in their intervention during plenary discussions, said that it was agreed on accepting the non-paper as a base text but was opposed to certain references to "primary plastic polymers". The committee is expected to aim for resolution on four broad themes: plastic products, chemicals of concern as used in plastic products, product design, and production/supply and related aspects; plastic waste management, emissions and releases, existing plastic pollution, including in the marine environment, and just transition; finance, including the establishment of a financial mechanism, capacity building, technical assistance and technology transfer, and international cooperation; and implementation and compliance, national plans, reporting, monitoring of progress and effectiveness evaluation, information exchange, and awareness, education and research, according to a bulletin by the International Institute for Sustainable Development.

A legal drafting group is expected to begin work on the initial and final provisions of the text before considering the substantive and operational aspects of the new treaty, it added.

(Source: The Hindu; 26th November, 2024)

भारत ने कोरिया गणराज्य के बुसान में अंतर–सरकारी वार्ता समिति के 5वें सत्र में प्लास्टिक प्रदूषण पर एक नए अंतर्राष्ट्रीय कानूनी रूप से बाध्यकारी कारक के लिए एक समर्पित बहुपक्षीय कोष का प्रस्ताव रखा

यह प्रस्ताव विकासशील देशों द्वारा अनुपालन को विकसित देशों द्वारा रूपांतरण की वृद्धिशील लागतों को पूरा करने से जोड़ता है। विकासशील देशों को तकनीकी एवं वित्तीय सहायता का प्रावधान प्लास्टिक प्रदूषण से निपटने के उद्देश्य से वैश्विक कार्रवाई को आगे बढ़ाने के लिए महत्वपूर्ण है। भारतीय प्रतिनिधिमंडल ने बुसान (कोरिया गणराज्य) में अंतर–सरकारी वार्ता समिति के 5वें सत्र में मॉन्ट्रियल प्रोटोकॉल के कार्यान्वयन के लिए स्थापित बहुपक्षीय कोष की तर्ज पर एक समर्पित बहुपक्षीय कोष की स्थापना करने का प्रस्ताव पेश किया। नए उपकरण के लिए वित्तीय तंत्र पर भारतीय प्रस्ताव में विकासशील देशों को प्रौद्योगिकियों के हस्तांतरण सहित वित्तीय व तकनीकी सहायता का प्रावधान अनिवार्य किया गया है, ताकि वे उपकरण में सहमत नियंत्रण उपायों का अनुपालन कर सकें।

इस प्रस्ताव में विकासशील देशों द्वारा अनुपालन को विकसित देशों के माध्यम से विकासशील देशों के रूपांतरण की वृद्धिशील लागत को पूरा करने के लिए अनिवार्य बनाया गया है। इसमें सबसे महत्वपूर्ण बात यह है कि प्रस्तावित नया समर्पित बहुपक्षीय कोष विकासशील देशों को अनुदान–आधारित वित्त प्रदान करेगा और विकसित देशों को समय–समय पर कोष को फिर से भरने तथा सहमति वाले तौर–तरीकों के आधार पर निजी निधियों को स्वीकार करने हेतु लचीलापन प्रदान करने का अधिकार दिया जाएगा।

भारतीय प्रस्ताव में बहुपक्षीय कोष के उद्देश्यों को प्राप्त करने के उद्देश्य से संसाधनों के वितरण सहित परिचालन नीतियां, दिशानिर्देश व प्रशासनिक व्यवस्था बनाने के लिए विकसित देशों तथा विकासशील देशों के बराबर प्रतिनिधित्व के साथ एक सहायक निकाय की स्थापना का भी प्रावधान है। इस तरह की व्यवस्था संयुक्त स्वामित्व लाती है। नए समर्पित बहुपक्षीय कोष द्वारा कवर की जाने वाली वृद्धिशील लागतों की सूची साधन के शासी निकाय द्वारा तय की जाएगी। प्रस्तावित सहायक निकाय विकासशील देशों को प्रौद्योगिकी हस्तांतरण के मुद्दों पर भी विचार करेगा।

वित्तीय तंत्र पर भारतीय प्रस्ताव विकासशील देशों द्वारा पर्यावरण अनुकूल प्रौद्योगिकियों को अपनाने के उद्देश्य से वित्तपोषण प्रदान करने के लिए एक व्यावहारिक मॉडल प्रदान करता है। भारत द्वारा प्रस्तावित मॉडल ओजोन परत को नष्ट करने वाले पदार्थों पर मॉन्ट्रियल प्रोटोकॉल के तहत कुछ समय से कार्यान्वित हो रहा है। इसलिए, यह एक व्यावहारिक और साध्य मॉडल है, जो प्लास्टिक प्रदूषण पर नए अंतरराष्ट्रीय कानूनी रूप से बाध्यकारी साधन के तहत प्लास्टिक प्रदूषण पर वैश्विक कार्रवाई को प्रेरित कर सकता है।

पृष्ठभूमि

वर्ष 2022 में संयुक्त राष्ट्र पर्यावरण सभा (यूएनईए) के पांचवें सत्र में वैश्विक स्तर पर प्लास्टिक प्रदूषण की समस्या को दूर करने के लिए एक ऐतिहासिक प्रस्ताव पारित किया गया। इस प्रस्ताव में अंतर–सरकारी वार्ता समिति (आईएनसी) को प्लास्टिक प्रदूषण पर एक अंतरराष्ट्रीय कानूनी रूप से बाध्यकारी साधन विकसित करने और वैश्विक समझौते के लिए एक प्रक्रिया शुरू करने का आदेश दिया गया। संयुक्त राष्ट्र पर्यावरण सभा के प्रस्ताव में 2024 तक अंतर–सरकारी वार्ता समिति की वार्ता को समाप्त करने की महत्वाकांक्षा रखी गई थी। साल 2022 से अब तक अंतर–सरकारी वार्ता समिति के चार सत्र उरुग्वे, फ्रांस, कनाडा और केन्या में आयोजित किए जा चुके हैं। भारत वार्ता में रचनात्मक रूप से शामिल होता रहा है। आईएनसी का पांचवां सत्र 25 नवंबर से 1 दिसंबर, 2024 तक बुसान में आयोजित किया जा रहा है, यह अंतर–सरकारी वार्ता समिति का अंतिम नियोजित सत्र है और इसमें अंतरराष्ट्रीय कानूनी रूप से बाध्यकारी साधन पर वार्ता पूरी होने की उम्मीद है।

(PIB Delhi –प्रविष्टि तिथि: 27 NOV 2024)

प्लास्टिक प्रदूषण को लेकर नए अंतर्राष्ट्रीय कानूनी रूप से बाध्यकारी उपकरण में निर्धारित स्पष्ट दायरा और सिद्धांत: बुसान में अंतर सरकारी वार्ता समिति के 5वें सत्र में भारत

भारत ने प्रस्तावित उपाय को अन्य बहुपक्षीय पर्यावरणीय समझौतों और अंतर्राष्ट्रीय निकायों के जनादेशों से अतिव्यापी होने से बचने के महत्व पर प्रकाश डाला है, ताकि प्लास्टिक प्रदूषण जैसे वांछित क्षेत्रों पर केंद्रित बातचीत हो सके सुनिश्चित। अंतर सरकारी वार्ता समिति (आईएनसी–5) के 5वें सत्र में भाग लेने वाले भारतीय प्रतिनिधिमंडल ने सदस्य राज्यों से प्लास्टिक प्रदूषण पर नए अंतर्राष्ट्रीय कानूनी रूप से बाध्यकारी उपकरण के लिए स्पष्ट दायरा और सिद्धांत विकसित करने का आह्वान किया। इससे अंतर्राष्ट्रीय स्तर पर नए समझौते को प्रभावी और व्यावहारिक बनाया जा सकेगा। आईएनसी–5 का आयोजन 25 नवंबर से 1 दिसंबर, 2024 तक बुसान (कोरिया गणराज्य) में किया जा रहा है। भारतीय प्रतिनिधिमंडल ने नए उपकरण के स्पष्ट दायरे के महत्व पर प्रकाश डाला, और कहा कि नए उपकरण को प्लास्टिक प्रदूषण को दूर करने के लिए, संयुक्त राष्ट्र पर्यावरण सभा (यूएनईए) के 5वें सत्र द्वारा 2022 में अपनाए गए प्रस्ताव से दायरे पर जनादेश प्राप्त करना चाहिए। इसके अलावा, भारत ने इस बात पर प्रकाश डाला कि बेसल, रॉटरडम और स्टॉकहोम कन्वेंशनों जैसे अन्य बहुपक्षीय पर्यावरणीय समझौतों और विश्व व्यापार संगठन जैसे अंतर्राष्ट्रीय संस्थाओं के जनादेशों के साथ कोई दोहराव नहीं होना चाहिए।

ऐसा दृष्टिकोण उन क्षेत्रों पर बातचीत को केंद्रित करने की अनुमति देगा जो पहले से मौजूद किसी भी अंतर्राष्ट्रीय उपकरण या संस्था के अंतर्गत शामिल नहीं हैं, विशेष रूप से प्लास्टिक प्रदूषण को दूर करने के संदर्भ में। भारतीय प्रतिनिधिमंडल ने पर्यावरण और विकास पर रियो घोषणा के सिद्धांतों का पालन करने वाले नए अंतर्राष्ट्रीय कानूनी रूप से बाध्यकारी उपकरण को समझने, उस पर काम करने, लागू करने, रिपोर्ट करने एवं मूल्यांकन करने की आवश्यकता पर जोर दिया। विकासशील देशों की सामान्य लेकिन अलग–अलग जिम्मेदारियों, राष्ट्रीय परिस्थितियों, प्राथमिकताओं और क्षमताओं, विकास के अधिकार और अंतर्राष्ट्रीय समझौतों या उपकरणों के अनुरूप सिद्धांतों पर विशेष जोर दिया गया। आईएनसी के अध्यक्ष द्वारा तैयार नॉन पेपर को बातचीत हेतु सुगम बनाने के लिए एक मूल्यवान दस्तावेज के रूप में स्वीकार करते हुए, भारतीय प्रतिनिधिमंडल ने पूर्ण अधिवेशन के दौरान उल्लेख किया कि ये महत्वपूर्ण अनुच्छेद नॉन–पेपर के तीसरे पुनरावृत्ति में गायब थे, जबकि वे ओटावा में आयोजित आईएनसी के चौथे सत्र द्वारा अपनाए गए संकलित टेक्स्ट में मौजूद थे। भारतीय प्रतिनिधिमंडल ने आईएनसी के अध्यक्ष से बुसान में आईएनसी के पांचवें सत्र के दौरान इन महत्वपूर्ण अनुच्छेदों पर चर्चा को शामिल करने का आह्वान किया।

(पर्यावरण, वन एवं जलवायु परिवर्तन मंत्रालयय 28–11–2024)

Bio-based fibers could pose greater threat to environment than conventional plastics

Bio-based materials may pose a greater health risk to some of the planet's most important species than the conventional plastics they are designed to replace, a new study has shown.

Such materials are increasingly being advocated as environmentally friendly alternatives to plastics, and used in textiles and products including clothing, wet wipes and period products.

However, microfibers of the materials are emitted into the environment through the laundry cycle, the application of sewage sludge as fertilizers, or the simple wear and tear of textile products.

Despite increasing quantities of bio-based products being produced and sold all over the world, there has been little research to assess their potential impact on species and ecosystems.

To address that, a study in the journal Environmental Science and Technology has tested the effects of conventional polyester fibers and two bio-based fibers—viscose and lyocell—on earthworms, a species critical to the health of soils globally.

The study found that in high concentrations of fibers, 30% of earthworms died after 72 hours when exposed to polyester, while those exposed to the bio-based fibers experienced much higher mortality of up to 60% in the case of lyocell and 80% for viscose.

A second experiment, using environmentally relevant concentrations of the fibers, indicated that earthworms housed in soils containing viscose fibers exhibited reduced reproduction compared to those exposed to polyester fibers. Earthworms in the soils containing lyocell fibers showed reduced growth and also higher rates of burrowing within the soil compared to exposure to the other types of fiber.

The researchers say the study highlights the complex nature of global efforts to reduce the threat of microplastic pollution, and the importance of testing new materials being advocated as alternatives to plastics before they are released on the open market.

The study was carried out as part of the BIO-PLASTIC-RISK project, led by researchers at the University of Plymouth and the University of Bath.

Dr. Winnie Courtene-Jones, lead author on the new study and now a Lecturer in Marine Pollution at Bangor University, said, "Over 320,000 tons of bio-based and biodegradable fibers were produced globally in 2022 and research shows that substantial quantities of that will end up in the environment. However, evidence of their ecological impacts has been lacking.

"Our study has shown that bio-based fibers have a range of adverse effects on earthworms— animals which are critical to the functioning of the environment. It highlights the importance of gathering further evidence before alternatives to conventional plastics are made available even more widely."

The new study follows research published earlier in 2024 which highlighted that being exposed to the materials used in biodegradable teabags can result in earthworm populations experiencing up to 15% greater mortality, and have a detrimental effect on earthworm reproduction.

It has been published just a few weeks before the United Nations gathers world leaders in Busan, South Korea, for the final round of negotiations regarding a possible Global Plastics Treaty.

Professor Richard Thompson OBE FRS, senior author on the new study and Head of the University of Plymouth's International Marine Litter Research Unit, will be at those discussions along with policymakers, scientists and other delegates from across the world.

He added, "It is clear that along with recycling and re-use, tackling plastic pollution will require a reduction in the quantities of plastics used and produced. There is increasing interest in alternative materials that could be used as substitutes for plastic, but this publication further emphasizes the importance of testing new innovations in relevant environmental settings prior to widescale adoption.

"I firmly believe it is possible to tackle the plastic pollution crisis, but independent scientific evidence will be critical in helping us avoid unintended consequences as we look for solutions."

(Source: Environment Science and Technology; University of Plymouth)

Municipal Waste Management merges with Collective Waste Solutions

Municipal Waste Management says this merger reflects its commitment to expanding its reach across Western Canada.

Municipal Waste Management (MWM), Souris, Manitoba, has announced its merger with Calgary, Alberta-based Collective Waste Solutions.

Established in 2006, Collective provides municipal, commercial and industrial waste collection services in Alberta.

MWM, which operates across Southern Manitoba, says this merger reflects its commitment to expanding its reach in Western Canada. This partnership marks MWM's third acquisition and initial entry into the Alberta region.

"We are thrilled to embark on this new partnership with Collective and to welcome Jim MacPherson and the Collective team to our family—this is as much a talent acquisition as it is a business combination," MWM CEO Logan Baniulis says. "Collective has been purpose-built and serves extremely [the] desirable markets of Calgary, Edmonton and Ft. McMurray. We are excited to invest in and grow the Collective business in a profitable, intelligent way. Together with Collective, MWM's aim is to build a fully integrated, independent waste company in Western Canada."

Collective will operate under the same name in Alberta, and all employees are being retained. Collective CEO Jim MacPherson will join the combined leadership team and the board of directors.

"Jim and the Collective team bring extensive industry experience and knowledge of Alberta and will be foundational for the growth plan we have," Baniulis adds.

"Logan and the MWM team offer us the opportunity for certain shareholders to exit, capital to expand the business throughout Alberta and growth opportunities for the Collective team," MacPherson says. "This is a great match, and we are excited for our shared future."

Concentric Equity Partners, a Chicago-based family office investor with experience in the waste industry, provided equity for the transaction, while Comerica Bank provided debt financing.

MNP Corporate Finance acted as financial advisor to Collective, and DS Avocats acted as legal counsel. Fillmore Riley acted as legal counsel to MWM, and DLA Piper acted as legal counsel to Concentric Equity Partners. Alvarez & Marsal provided transaction advisory services, and Concentric was provided buy side advisory services by Spearhead Corporate Development.

(Source: Waste Today; 12th November, 2024)

BIR Autumn 2024: A treaty in troubled waters

To what extent a United Nations-backed global treaty on the future of plastics has enforceable mandates could greatly affect plastic recycling activity.

Current and prospective investors in plastic recycling remain uncertain about how or whether the Global Plastics Treaty being written by the United Nations Environment Program (UNEP) will provide genuine backing to their efforts.

At the International Environment Council (IEC) meeting of the Brussels-based Bureau of International Recycling (BIR), held in Singapore in late October, several presenters expressed skepticism as to whether the treaty will create mandatory recycling targets that would provide a boost to a global plastic recycling market that has experienced a difficult year.

BIR Trade and Environmental Director Alev Somer was among those who cautioned recyclers that a ratified version of the treaty may end up being a voluntary agreement rather than a legally binding treaty.

Plastic recycler Max Craipeau of Singapore-based Greencore Resources says a legally binding version of the treaty would have a greater impact in Asia, from where most of the world's ocean-bound plastic emanates.

Craipeau said a mandatory recycled content percentage for packaging was particularly important, calling it "essential" for plastic recyclers to be profitable in Asia. "If not, it will be like Europe," said Craipeau, referring to a situation where brand owners and packaging producers seem to have bypassed recycled-content resins this year when the price drifted higher than that for virgin material.

Sophie Sicard of France-based Paprec, who joined the discussion remotely, said extended producer responsibility (EPR) program backing—which could be a part of the final UNEP treaty—could be useful to increase collection in Asia and other parts of the world with developing economies.

However, she cautioned, EPR programs must not become monopolies and competitors to our industry, another challenge to plastic recycling investors that has reared its head in Europe.

Robin Wiener, president of the Washington-based Recycled Materials Association (ReMA), said that organization sees proposed aspects of the Global Plastics Treaty it favors but others that cause concern.

Among welcome aspects would be attention to design for recycling (DFR), potential targets or mandates for recycled content percentages and financial support for recycling collection and other infrastructure.

Less welcome, Wiener said, would be recycled materials export controls, EPR programs that hinder private enterprise and any equating of plastic scrap-to-energy or fuels (known by its adherents as chemical recycling or advanced recycling) with mechanical recycling.

In reference to the latter, Wiener said, "If you label waste management technologies and waste management processes as recycling, that's not recycling. Definitions become incredibly important in the treaty."

Overall, Wiener characterized the treaty as "a very important step forward" to solving the problem of an estimated 14 million tons of plastic finding its way to the planet's oceans each year.

"I appreciate the full life cycle [of plastic] is being looked at," she said.

The treaty's view toward the recycling industry, Wiener said, is that it "is not the whole solution, but is part of it. I'm glad they're not throwing us under the bus."

The future of the treaty remains unclear, with perhaps only a little more clarity to be provided at the fifth (and potentially final) Global Plastics Treaty meeting in Busan, South Korea, Nov. 25 to Dec. 1.

"We have basically only a compilation text which is definitely very far from the final treaty that we could have, and there are still many open questions, starting with whether this will be a voluntary agreement or a legally binding instrument," Somer said.

She and other panelists referred to intense lobbying that has taken place at the previous four meetings, with much of that lobbying pressure exerted toward making a nonbinding treaty that places few burdens on primary plastics producers.

Recyclers Sicard and Craipeau said at the very least the UNEP treaty should support the plastic recycling that is already occurring. To Sicard, that includes cross-border trading, calling some current and proposed trade restrictions "not sustainable."

Craipeau said global mechanical recycling investments to recycle polyethylene terephthalate (PET) beverage bottles have demonstrated proof of concept for mechanical recycling, although in Asia he says only 30 percent of PET bottles are collected for recycling.

He said a treaty that mandates and enforces recycled content targets and perhaps deposit-return systems can act as a "pull mechanism" for the remaining PET bottles and, ideally, other forms of plastic packaging.

The 2024 BIR World Recycling Convention Round-Table Sessions was held at the Raffles City Convention Center/Fairmont Hotel in Singapore on Oct. 27-29.

(Source: Recycling Today; 6-11-2024)

LA County sues Pepsi, Coca-Cola over pollution caused by plastic bottles

'Coke and Pepsi need to stop the deception and take responsibility for the plastic pollution problems your products are causing,' LA County supervisor Lindsey Horvath said in a statement

Los Angeles County is taking on Pepsi and Coke for their role in plastic pollution.

In a lawsuit filed Wednesday, the county alleged PepsiCo and Coca-Cola companies have misled the public about the recyclability of their plastic bottles and downplayed the negative environmental and health impacts of plastic disposal.

"Coke and Pepsi need to stop the deception and take responsibility for the plastic pollution problems your products are causing," LA County supervisor Lindsey Horvath said in a statement. "Los Angeles County will continue to address the serious environmental impacts caused by companies engaging in misleading and unfair business practices." Coca-Cola owns brands like Dasani, Fanta, Sprite, Vitamin Water, and Smartwater, while PepsiCo owns Gatorade, Aquafina, Mountain Dew, and more. The two companies have been ranked as the world's top plastic polluters for five consecutive years, and Coca-Cola has taken the number one spot for six years, according to global environmental group Break Free From Plastic.

PepsiCo produces approximately 2.5 million metric tonnes of plastic and Coca-Cola produces approximately 3.224 million metric tonnes of plastic annually, according to Break Free from Plastic.

A European Union consumer protection group and environmental organizations filed a legal complaint against Coca-Cola, Nestle, and Danone last November, accusing them of being misleading when representing packaging as 100 per cent recycled or 100 per cent recyclable.

The LA lawsuit said Coca-Cola and PepsiCo have employed disinformation campaigns for consumers to purchase single-use plastic, believing them to be recyclable and less harmful to the environment.

It alleged that both companies promised to create a circular economy for its bottles, in which plastic bottles can be recycled and reused an endless number of times, while in reality plastic bottles can only be recycled once, if at all.

The American Beverage Association, which PepsiCo and Coca-Cola are a part of, denied the lawsuit's accusations about their plastic bottle recycling labels.

The allegation that our packaging is not and will not be recycled is simply not true, the group's spokesperson William Dermody said in a statement.

Dermody said California had a 71 per cent bottle recycling rate in 2023, one of the highest in the country, and that their bottles are designed to be recycled and remade and can include up to 100 per cent recycled plastic.

In 2022 alone, an estimated 121,324 to 179,656 tonnes of plastic waste leaked into the land and ocean in California, and plastics make up seven of the top 10 litter products found on beaches, the lawsuit states.

A big part of the problem is microplastics.

Plastics that have leaked into the environment eventually disintegrate into tiny pieces of plastic measuring five millimeters or less. They can affect soil and plant growth, marine and fish life, and are nearly impossible to remove from the environment, the lawsuit states.

Some Australian researchers, on behalf of the World Wildlife Fund, calculated in 2019 that many people each week consume roughly 5 grams of plastic from common food and beverages, and microplastics have been found in body tissues and organs. Though research is still limited overall, there are growing concerns that microplastics in the body could potentially be linked to heart disease, Alzheimer's and dementia, and other problems.

The lawsuit is seeking a court order to stop the companies' unfair and deceptive business practices as well as restitution for consumers and civil penalties of up to $2,500 per violation.

In February 2020, environmental nonprofit Earth Island Institute filed a lawsuit in California asking for damages and an order for Coca-Cola, PepsiCo, Nestle USA, Procter & Gamble and six other companies to clean up the plastic waste they should be held responsible for.

New York state also sued PepsiCo last November for its role in creating the plastic waste that littering the Buffalo River, which empties into Lake Erie and supplies the city of Buffalo's drinking water.

(Source: Business Standard; November 1, 2024)

NEWS IN BRIEF

Centre suggests states to list power firms, tackle rising AT&C losses

Power Minister Manohar Lal on Tuesday urged states and union territories to consider listing their power generation, transmission, and distribution companies on stock exchanges to attract investment and improve operational efficiency. Addressing the media, after a conference of power ministers, Lal highlighted the need for increased capital inflows to meet India's rising power demand, which has placed added strain on the sector.

"With the growing power demand, there is a growing need for investment in the sector and improving operational efficiencies. States may identify and take up utilities for listing," he said. Haryana and Gujarat have shown interest to pursue listing initiatives, a move expected to enhance transparency and strengthen the financial health of the sector.

The Centre has pushed states to tackle Aggregate Technical and Commercial (AT&C) losses, which hit 17.6% in FY24, up from 15.4% in the previous fiscal year. The government suggested states calculate with 18 sites already shortlisted for potential nuclear plants. "States must prioritize nuclear power and secure adequate sites for new projects," Lal noted, underlining nuclear energy as a sustainable option for India's future energy needs.

To boost smart meter installation, the government suggested offering concessional tariffs as an incentive. This aligns with the broader goal to improve grid management and reduce power theft, a pressing issue that impacts the financial health of the sector.

Highlighting the fiscal challenges faced by power distribution companies (discoms), the minister shared alarming figures: the outstanding debt of discoms stands at Rs 6.84 lakh crore, while accumulated losses have reached Rs 6.46 lakh crore. Lal called on states to prioritize reform measures to reduce this burden and improve financial sustainability.

(Source: ETEnergyWorld; 12th November, 2024)

MSMEs should strive for greater credit discipline and continue to embrace formalisation

MSMEs should strive for greater credit discipline which starts with careful selection of the appropriate credit product suited to their requirements and cash flows, according to Swaminathan J, Deputy Governor, Reserve Bank of India. He noted in a latest speech that MSMEs should prioritise formalisation. Many MSMEs operate informally, making it challenging for lenders to assess their creditworthiness due to information asymmetry, particularly regarding their financial performance. By registering on the Udyam Portal and filing GST returns, MSMEs can enhance the transparency over their level of business activity and financials. This will enhance their credibility and may qualify them for priority sector lending and government schemes, by reinforcing their trustworthiness in the eyes of financial institutions.

Continuing with embracing formalisation, MSMEs should maintain comprehensive and accurate financial records which are essential for seeking credibility with lenders. MSMEs should adopt proper accounting practices, ensuring their financial records, such as income statements, balance sheets, and cash flow statements are accurate and reliable. Having financial statements prepared by certified professionals and audited by qualified auditors shall further bolster their credibility. Along with formalization, adopting digital payment systems like UPI and online banking creates a digital footprint of financial transactions, making it easier for lenders to assess financials of the firm. Digital payments also improve cash flow management; offering MSMEs greater control over their finances and helping them maintain a clear financial record.

(Source: Business Standard; November 26, 2024)

दिल्ली में बिजली विभाग के नियमों से व्यापारियों के लिए बढ़ती समस्याएँ–दिल्ली सरकार ध्यान दे

दिल्ली में पहले व्यापारी जितना चाहे KW बिजली का कनेक्शन ले सकता था, बिजली का लोड अपनी आवश्यकता अनुसार कम–ज्यादा करवा सकता था। परन्तु अब नियम बहुत कठोर कर दिये गये है। यदि व्यापारी अपना लोड घटवाना चाहे तो वह अपनी मर्जी से लोड नही घटवा सकता है। जितनी MDI आ रही है उसका दोगुना तक ही लोड रखना ही पड़ेगा।

उदाहरण– यदि आपका कलेक्शन 100 KW है। ओर आपको 50 KW करवाना है व आपकी MDI 45 आ रही है तब आपका लोड सिर्फ 10 KW ही घटेगा। यानी आपको 90 KW का कनेक्शन रखना ही होगा।

उस पर फिक्स चार्ज व अन्य टैक्स भरने होंगे।

दिल्ली सरकार से निवेदन है कि इन नियमों में बदलाव कर व्यापारियों को राहत दे। व्यापारी की जरूरत के हिसाब से कनेक्शन का लोड कम–ज्यादा करने में सरलीकरण कर व्यापारियों का हित करे।

तरूण बंसल। मोबाइल – 9811530017

ALL INDIA PLASTIC INDUSTRIES ASSOCIATION

ADVERTISEMENT TARIFF & MECHANICAL DATA FOR

PLASTIC WORLD DIRECTORY-2025

I. TARIFF FOR COVER PAGES	RATES
Front Cover (with Side Panel) – Four Colour	BOOKED
Front Inside Cover – Four Colour	BOOKED
Back Cover – Four Colour	BOOKED
Back Inside Cover – Four Colour	30000 + 18% GST

II. Four Special Pages after Cover Pages: + 18% GST

(1)=Rs.28,000/- (2)=Rs.16,000/- (3)=Rs.14,000/- (4)=BOOKED

III. Page No. 1 = Rs. 15,000 +(18% GST)	BOOKED

IV. Specific position of advertisement in 4 colour on art paper before "FOREWARD" (Subject to availability)	
1. Inside Full Page – Right Position	Rs.11, 000 + 18% GST
2. Inside Full Page – Left Position	Rs. 9, 000 + 18% GST
3. Inside Full Page-Two Colour (On Art Paper)	Rs. 4, 500 + 18% GST
4. Inside Full page (Black & White) {ordinary paper}	Rs. 2, 500 + 18% GST
5. Half Page B/W on ordinary paper	Rs. 1, 600 + 18% GST
6. Running Stripes at the top, middle, bottom	Rs. 1,000**+ 18% GST

Special Note: An Incentive of 10% on the Tariff shall be extended to all advertisers who make ADVANCE PAYMENT.

MECHANICAL DETAILS

	Print Area
1. Front Cover	15 cm (V) x 15 cm (H)
2. Back Cover and all rest full pages	20 cm (V) x 15 cm (H)
3. Half page	10 cm (V) x 15 cm (H)
4. Running Stripes	5cm(V) x 15 cm (H) **

Bank Details:
Name: ALL INDIA PLASTIC INDUSTRIES ASSOCIATION
Name of the Bank: BANK OF INDIA (Ashok Vihar, Delhi-110052)
Saving Account No. 603110100005876 IFSC Code: BKID0006031
GST No.: 07AAAAA0915D1ZI

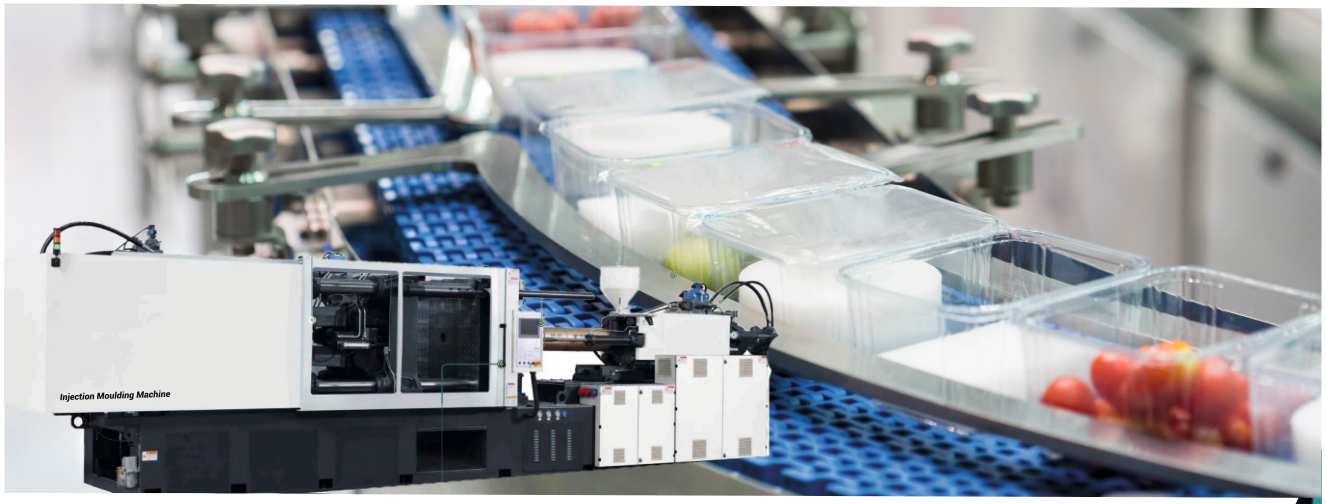
Note:
(a) All printing process on offset **(b)** Art work/Art pull/negatives and positives for printing to be provided by advertiser (c) All payments may be made in advance through Bank transfer/DD/local cheques payable at Delhi/New Delhi drawn in favor of **All India Plastic Industries Association.** (d) Preference will be given to regular advertisers (e) Rest – On first come first serve basis (f) Advertisements will be accepted at the discretion of the Association

09-11
January, 2025

INDUS FOOD MANUFACTURING

YASHOBHOOMI IICC,
Dwarka, New Delhi

A One-Stop Supplier Exhibition for F&B Industry



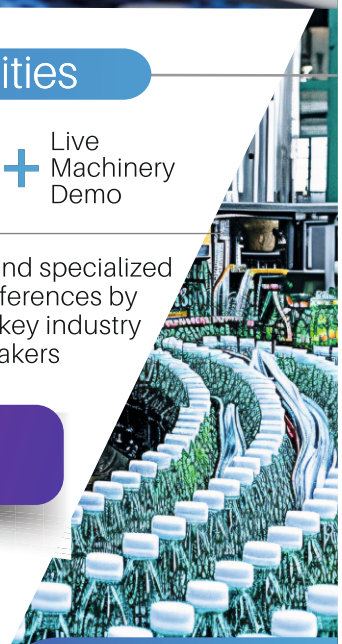
Save the Date and Unlock opportunities

3 days of pure business networking.

500+ Exhibitors under one roof

200+ Live Machinery Demo

- Witness the latest technologies & gain valuable insights.
- Discover emerging trends and technologies
- Connect with industry peers and form valuable partnerships.
- Attend specialized conferences by the key industry speakers



Register Now

Organized By TPCI Trade Promotion Council of India

Supporting Association

Participating Brands

agropac · MAMATA MACHINERY VALUE FOR TRUST · neelgiri Group · RPPL RAJSHREE POLYPACK LIMITED · SURAJ · UFLEX 'A part of your daily life'

and many more...

Visitor Registration

Contact us

Himanshu Dwivedi | E: himanshu.d@tpci.in **|M:** +91-8882212713

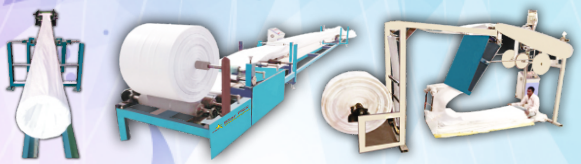
indusfoodmanufacturing.co.in

Star Flex INTERNATIONAL

Flexographic (Woven Sack) Printing Machine (Auto Roll Changing)

ATUF Registered

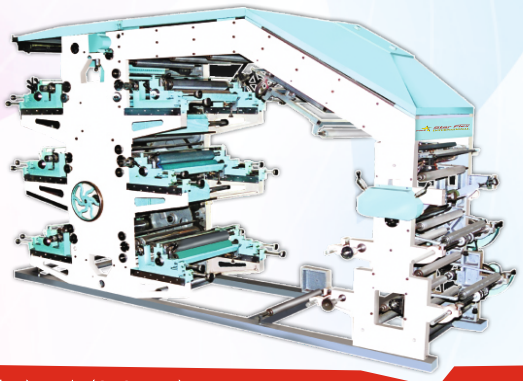
Auto Reversing Machine



4000MM

Flexographic Wide Web Printing Machine

Flexographic Printing Machine



Quality Through Creativity

ISO 9001 : 2015 CERTIFIED

Plot No. A-43, Street No.-7,
Anand Parbat Industrial Area,New Rohtak Road,
New Delhi-110 005 (India) Ph. : +91-11-28765588,
Telefax : +91-11-43563747, Mob : +91-9310307888
E-mail : info@starflex.co.in
www.starflexinternational.com

We are in the making of critical colour Masterbatches of Polyolefine groups over the last several years. Our wide range of Masterbatches from **JK PARAS POLYCOATS LTD.** are used in Extrusion, Blow, Injection & Roto Moulding Industries.

We Serve :

White, Black & Standard Colours.

Custom Matched Colours.

Filament Grades Masterbatches.

Additives Masterbatches.

Metallic, Pearlcent, Marble, Flourescent

P.P. Mineral Filled Compounds, Anti Fibrillation Compounds

Polycoat Compound

For Further Information :

JK PARAS POLYCOATS LIMITED

(UDYOG SHRI AWARD WINNER)

WZ-2A, Hind Nagar, Chaukhandi Road, Tilak Nagar, New Delhi-110018
Ph. : +91-9773562525, 9773542525, 9810080262, 9810175478
e-mail : info@jkpmasterbatches.com Visit us at : www.jkpmasterbatches.com

IS : 694

CM/L-8100155661

BERLIA®

CABLES • PVC CONDUIT PIPES • FITTINGS

011-47505602
011-40158433
9818643248

BERLIA ELECTRICALS POLYMER PVT. LTD.

AN ISO 9001:2015 Certified Company

1826, 1st Floor, Old Amarnath Building Bhagirath Palace Chandni Chowk Delhi- 110006

E-mail : beppldelhi@gmail.com

R K Engineering Works

Since 1972

RK ROTATING TAKE UP 3 LAYER BLOWN FILM PLANT (A+B+C Type)

Special Features:

♦ Compact design ♦ Requires small floor space area ♦ Low power consumption ♦ Cost efficient ♦ Suitable for manufacturing:

❄ Lamination Poly ❄ Courier Bag ❄ Shrink Bag ❄ Milk Pouches ❄ Water Pouches

A-43, Street No. 6, Anand Parbat Indl. Area, New Rohtak Road, New Delhi-110005
Plot No 1799, 1800, 1801, MIE Part-B, Bahadurgarh, Jhajjar, Haryana-124507
Telefax : 91-11-43068550 MANOJ SHARMA : 91-9313323539
Email : sales.rkenggworks@gmail.com
Website : www.blowfilmmachine.net, www.rkengworks.com