



Construction Sustainability Day – “*Green Innovations in Construction: Advancing Sustainability*”



Kris Adidarma
CEO, PT Propan Raya
President, Asosiasi Produsen Cat Indonesia
Jakarta, 12 June 2024

ASOSIASI PRODUSEN CAT INDONESIA (*INDONESIAN PAINT MANUFACTURE ASSOCIATION*)

Vision:

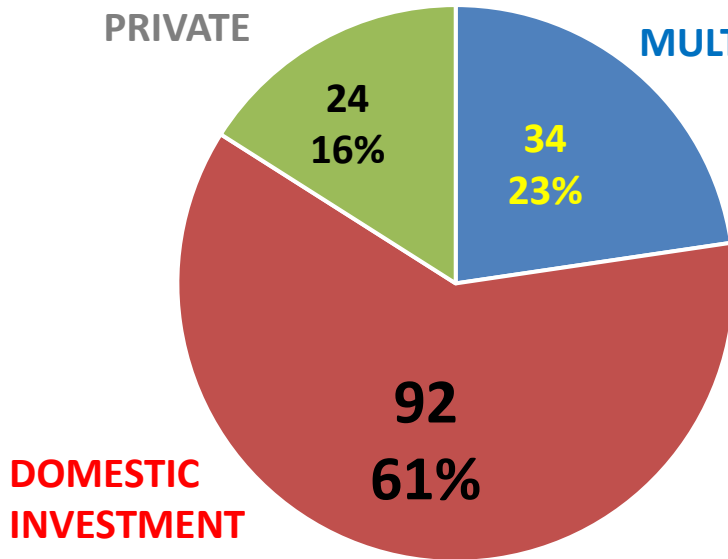
Bringing local company to be host in our own country with world class reputation in quality and technology

Mission:

1. A forum for channeling members' activities and aspirations
2. As a government partner in bridging communication between the government and paint manufacturers
3. To protect, equip and develop the paint industry with current knowledge and technology about paint by collaboration with stakeholders
4. Play a role in the success of national development
5. To protect consumers from non-standard products and those that endanger health
6. Encourage paint manufacturers to produce eco-friendly products
7. To be a center for information and statistical data related to the paint business and industry



GENERAL OVERVIEW OF THE DOMESTIC PAINT INDUSTRY



MULTINATIONAL

Market segment include: MOPC, Decorative Automotive, Industrial, Wood finish, etc.

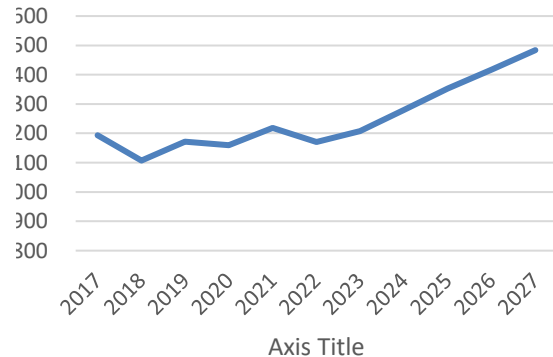
Installed capacity is about 1,6 mio MT/year
Domestic demand is about 1,3 mio MT/year

Total worker around 36.000 people

Current APCI members is 71 companies from total about 150 paint companies, almost all of which are located in Java Island

Total paint consumption projection of Indonesia

Yearly estimate of volume of Paint consumption in Indonesia



Source: Dow, market data

- **Construction spending in Indonesia will enjoy a healthy 5.1% compound annual growth rate (CAGR) between 2022 and 2027 with growth led by the infrastructure segment. In the longer run, growth will slow to a 4.2% compound annual rate between 2027 and 2032. The infrastructure segment will again demonstrate the highest growth over the period.**
- **Indonesia is working on large-scale infrastructure projects to modernize and restructure the country, including for the relocation of the capital city to East Kalimantan.**
- **The construction industry remains positive with healthy growth expected, although the industry may face challenges from high commodity prices and the ongoing global economic slowdown.**

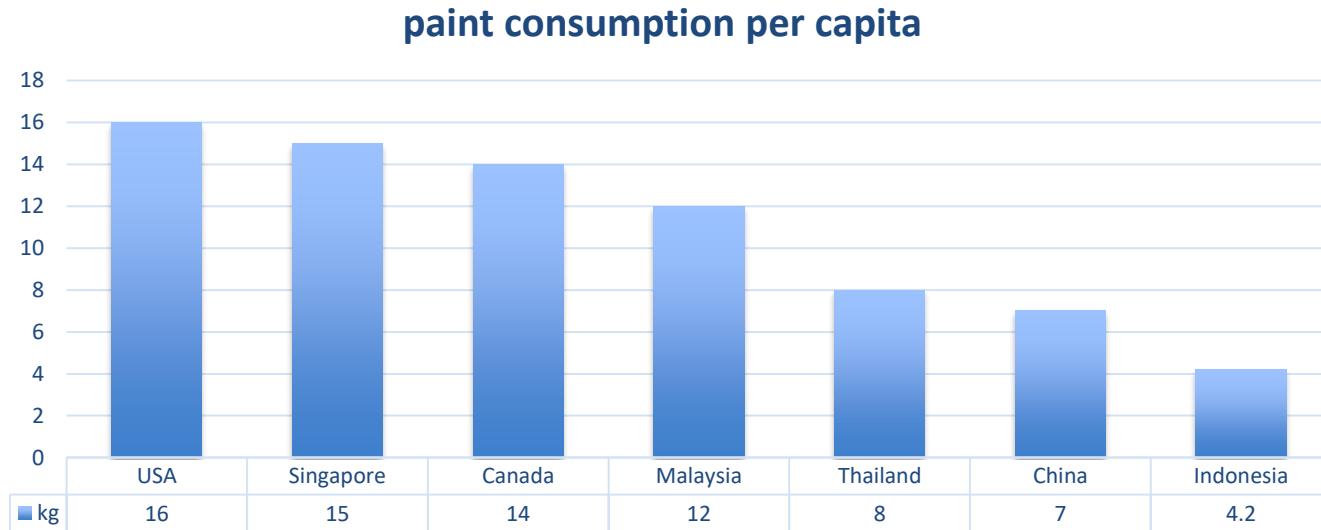
Market Overview

Paint consumption (mT)	2019	2023
Other Industry	14,980	15,729
Wood	89,740	76,279
MOPC	22,500	24,075
Powder	11,240	11,802
Coil	4,590	4,590
Can	5,202	5,150
Auto Refinish	5,785	6,132
Auto OEM	7,000	7,350
Decorative WB	940,700	1,053,584
Decorative SB	70,200	74,412
total	1,171,937	1,279,103

- After recovering from covid 2023 shows a good growth surpassing pre pandemic

Source: DOW chemical, Axalta, Own data

Paint Consumption per capita



<https://www.indianchemicalnews.com/compendium/paints-coatings-industry-captains-lay-thrust-on-innovation>

APCI has 4 Standing Committees:



01

Industrial Development

- Government Regulations
- Supplier collaboration
- Basic Paint Knowledge with 765 participants
- Pigment with 668 participants

02

Product Standardization

- 35 SNI paint products
- TKDN

03

Environmental

- Environmental Policies
- Health Safety and Environment
- Education and Seminars on HSE

04

Human Capital

- Newsletter www.apci.info
- Indonesian National Work Competency Standards (SKKNI)
- Paint Technology School

Paint Technology Vocational School

- Inauguration: 3 July 2024
- The first in South East Asia
- Ensure output of vocational school is demand driven
- APCI is responsible for the curriculum
- Looking for help such as subject expert for teaching, donations of equipment, scholarships etc.



Sustainability refers to the practice of meeting present needs without compromising the ability of future generations to meet their own needs. It encompasses three main pillars:

1. **Environmental Sustainability:** Protecting natural resources and ecosystems by reducing pollution, conserving resources, and promoting biodiversity.
2. **Economic Sustainability:** Ensuring that economic activities are viable in the long term, providing prosperity and employment without depleting resources.
3. **Social Sustainability:** Promoting social equity, well-being, and quality of life for all individuals and communities.



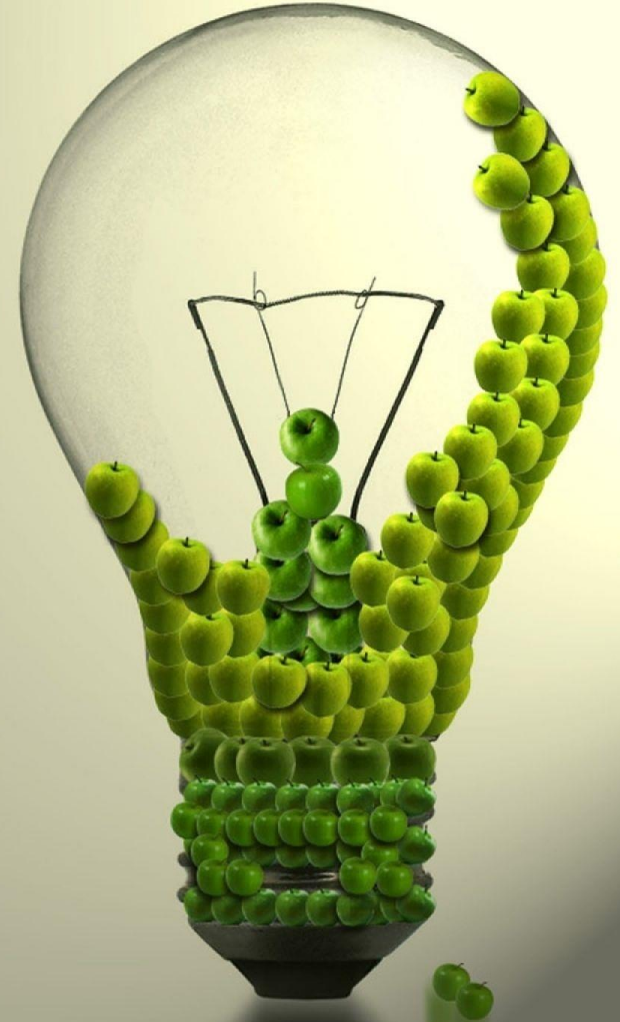
Economic



Ecological



Social







Sustainability in the Paint Industry

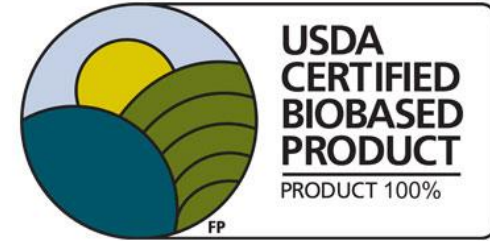


In the context of the paint industry, sustainability involves several key practices and innovations aimed at minimizing environmental impact, promoting health, and supporting long-term economic and social goals:

1. Reducing Volatile Organic Compounds (VOCs):

- Traditional paints often contain VOCs that evaporate and contribute to air pollution and health problems.
- Sustainable paints have low or zero VOC content, improving indoor air quality and reducing harmful emissions.

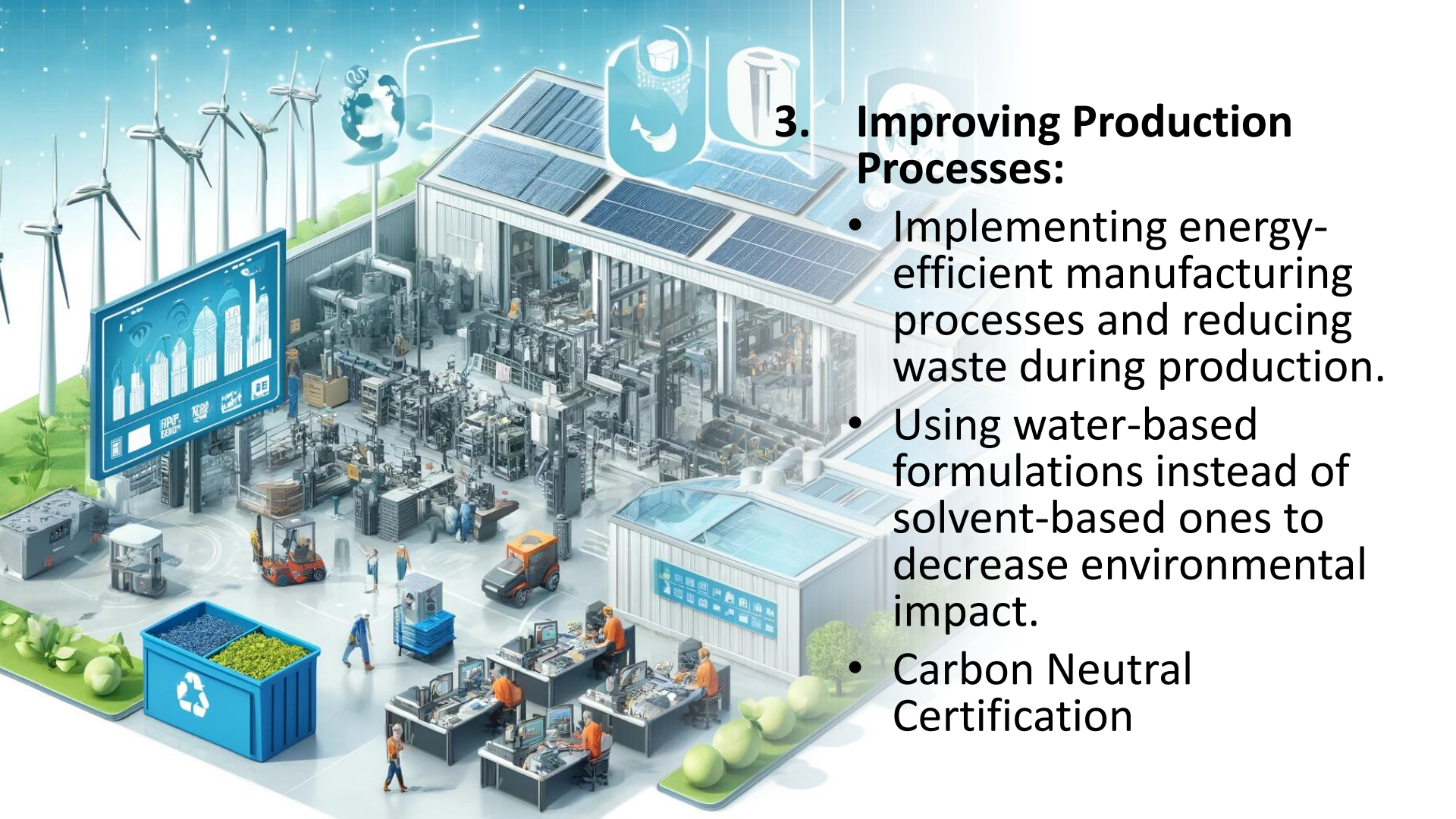
			
between 20 and 40% biobased	between 40 and 60% biobased	between 60 and 80% biobased	more than 80% biobased



2. Using Eco-friendly Raw Materials:

- Sustainable paints incorporate raw materials that are biodegradable, recyclable, or derived from renewable resources.
- This reduces the dependency on finite resources and minimizes the environmental footprint.





3. Improving Production Processes:

- Implementing energy-efficient manufacturing processes and reducing waste during production.
- Using water-based formulations instead of solvent-based ones to decrease environmental impact.
- Carbon Neutral Certification

4. Promoting Product Longevity and Durability:

- Creating paints that are more durable and long-lasting, which reduces the frequency of repainting and conserves resources.
- Innovations such as heat reflective, direct to metal can enhance the protective qualities and lifespan of paints.





5. Supporting Recycling and Disposal:

- Encouraging the recycling of paint containers and providing guidance on the proper disposal of leftover paint.
- Developing take-back programs or partnerships with recycling organizations.

6. Health and Safety:

- Ensuring that paint products are safe for users and occupants by eliminating toxic substances.
- Providing clear labeling and information on product safety and environmental impact.





7. **Corporate Social Responsibility (CSR):**

- Engaging in community projects and initiatives that promote sustainability and environmental education.
- Collaborating with stakeholders to advance industry-wide sustainability goals and standards.

Trends in construction Industry

- Green Building Certifications and Standards
- Energy-efficient Buildings
- Renewable Energy Integration to achieve Carbon Neutral and Net-zero Buildings
- Sustainable Building Materials
- Waste Reduction and Management
- Water Conservation
- Health and Wellness Focus
- Circular Economy Principles
- Climate Resilience
- Digitalization and Smart Technologies
- Community Engagement and Social Sustainability





Challenges and Opportunities

- **Key challenges in promoting sustainability in paints.**
 - Regulatory hurdles: Enforcement and Bureaucracy
 - Market awareness, acceptance and cost
 - Technological limitations
- **Opportunities for innovation and growth.**
 - Emerging technologies and materials
 - Increased demand for sustainable products
 - Strategic partnerships and collaborations



*“WE DO NOT INHERIT THIS EARTH FROM OUR
ANCESTORS, WE BORROW IT FROM OUR
CHILDREN”*

- NATIVE AMERICAN PROVERB