



Innovations in Processed Foods: Pathways to Health and Wellness

Bridging the Gaps between Science & Perception

Rini Sanyal

PFNDAI SEMINAR

9th October 2026



INDIA'S EVOLVING FOOD CONSUMPTION PATTERNS

FROM STAPLE FOODS TO HEALTH & WELLNESS CHOICES



RICE & WHEAT DOMINANCE ?

Historically, Indian diets were centered around carbohydrate-rich staples.



URBANIZATION & LIFESTYLE SHIFTS 🏙️

Rising incomes and exposure to diverse food cultures reshaped preferences.



GLOBALIZATION OF FOOD CHOICES 🌍

International cuisines became increasingly mainstream across India mainly Chinese, Japanese, Italian, Korean



RISE OF NUTRIENT-RICH FOODS ?

Growing interest in balanced nutrition, millets, quinoa and nutrient-dense foods.

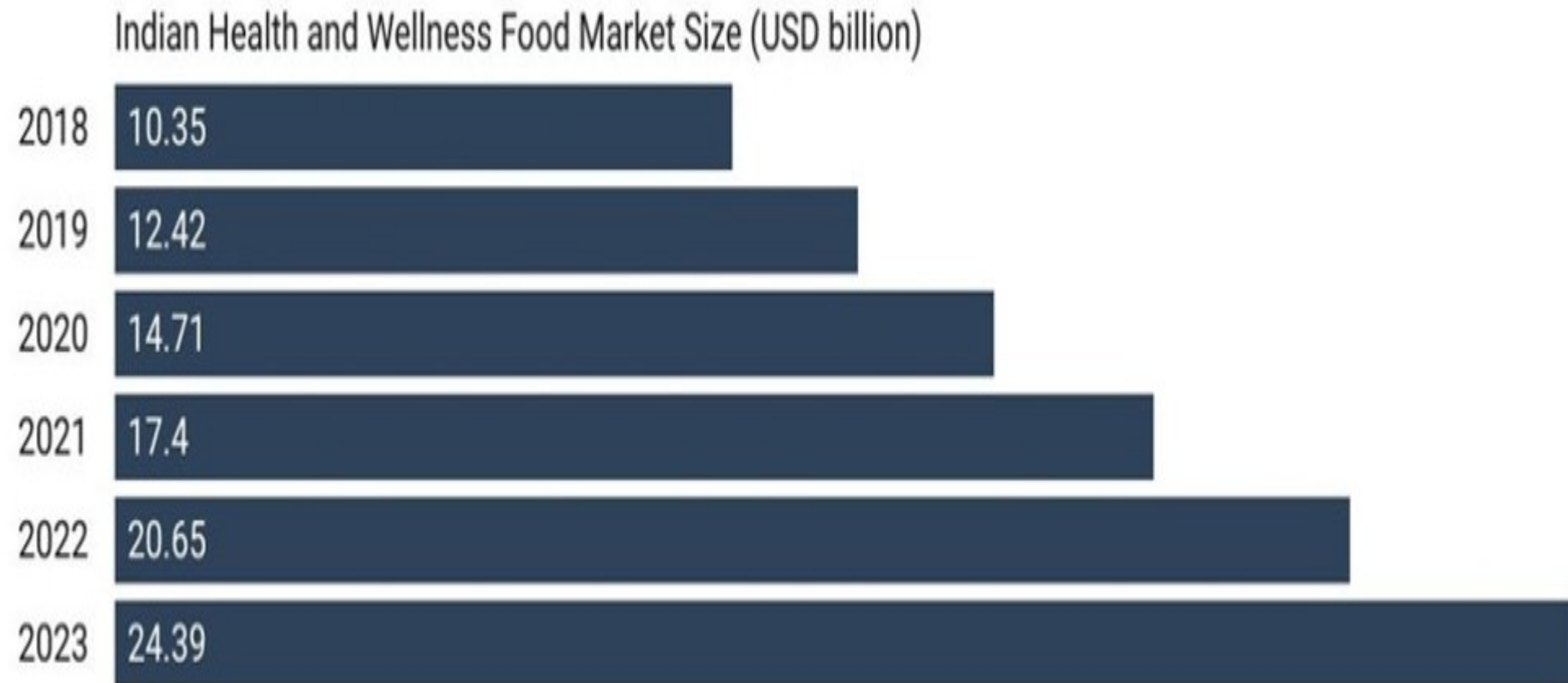


HEALTH & WELLNESS FOCUS ?

Rise in health-conscious consumers looking for healthier options, Feel good, look good factors rising. Demand for functional foods, supplements and specialized nutrition solutions.

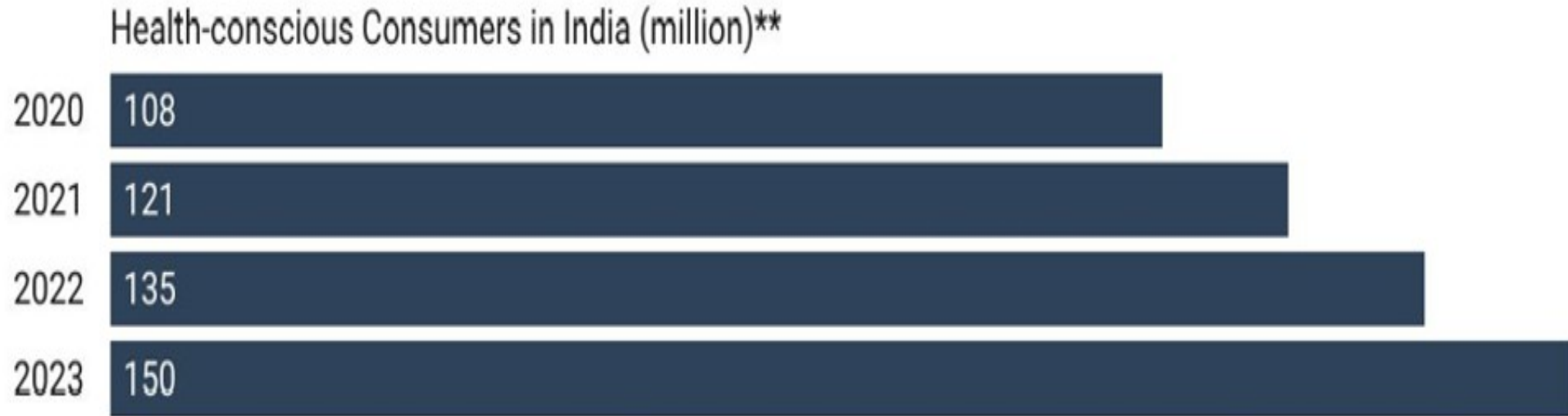
Key Takeaway: Indian food consumption is transitioning from calorie dense foods toward nutrition, wellness, and personalized health solutions.

INDIA'S HEALTH & WELLNESS FOOD MARKET: A RAPID GROWTH STORY 2019- 2023



Source: Invest India

RISE OF THE HEALTH-CONSCIOUS CONSUMER IN INDIA 2020-2023



KEY GROWTH DRIVERS

- Staying Fit Wellness-focused lifestyles
- Growing nutrition awareness
- Higher adoption of supplements & nutraceuticals
- Digital access to health information
- Improved product accessibility and affordability

Source: Invest India

SUPPLEMENTS / NUTRACEUTICALS – ADDING LIFE TO YEARS

Are supplements necessary ??

Are these foods?



Supplements are most effective as an addition to a healthy diet, not a replacement for food

01

ADDRESS NUTRITIONAL GAPS

Help meet daily nutrient requirements
Support nutritional adequacy
Useful where dietary intake may be insufficient
Not as a replacement of food

02

SUPPORT HEALTHY LIVING

Active lifestyles
Healthy aging
General wellness support
Everyday health maintenance

03

COMPLEMENT A BALANCED DIET

Not a substitute for food
Work alongside healthy eating habits
Support long-term wellness goals

04

FORMATS & APPLICATIONS

□ Tablets & Capsules □ Powders □ Gummies

Supporting: Gut Health, Bone Health, Eye Health, Skin & Hair Health, Sports Nutrition etc.

Supplements and nutraceuticals help support normal health and wellness by complementing balanced diet and healthy lifestyle

UNDERSTANDING FOOD SCIENCE

Communication • Awareness • Nutrition Science

FOOD • SCIENCE • TRUST

Food science is complex — communication should not be

RIGHT COMMUNICATION

No myths • No hearsay • No perceived notions
Use clear, factual and evidence-based messages

INCREASED AWARENESS

Set realistic expectations about the product, its benefits and long-term use
Explain limitations and responsible use

ROLE OF NUTRITION SCIENCE

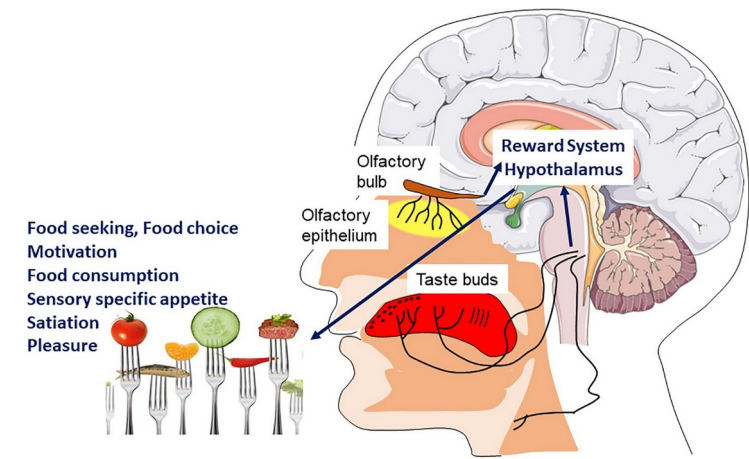
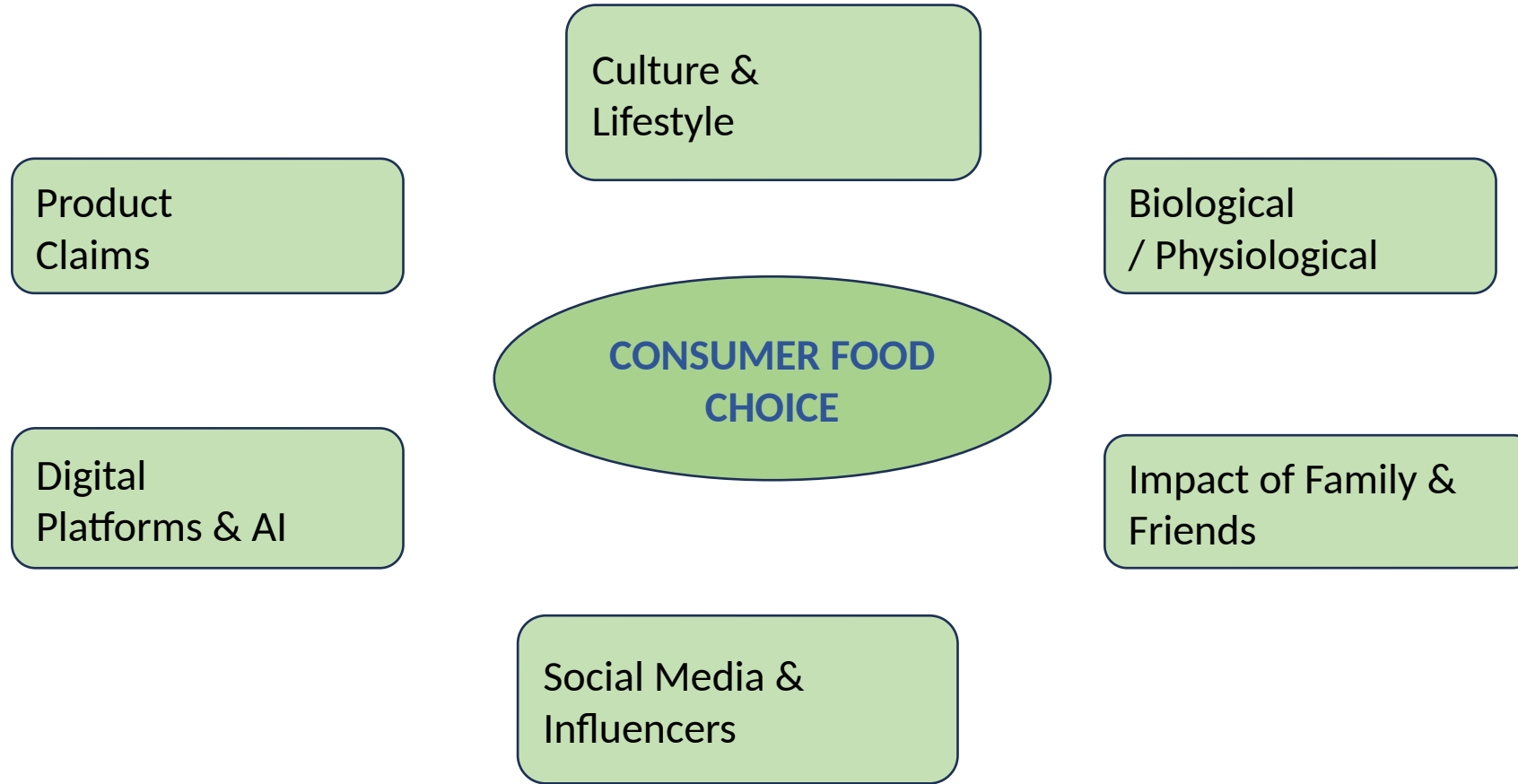
Basic nutrition science helps consumers understand ingredients
products and make informed choices
Consider individual needs and context

PROFESSIONAL GUIDANCE

For health-related goals, consulting a qualified nutritionist or dietitian is
advisable before starting a health regime

Accurate information → Informed consumers → Responsible choices → Stronger trust

FACTORS SHAPES FOOD CHOICES



INFORMATION OVERLOAD

Lack of credible information | Conflicting health messages | Need for science-backed guidance

MYTHS HELP FORMING PERCEPTION – AWAY FROM REALITY

Myths	Reality
Jaggery, honey, and raw sugar are "healthy" alternatives to white sugar	From metabolic standpoint, jaggery (<i>gur</i>) and honey and raw sugar spike insulin and blood glucose almost identically to white sugar
Carbohydrates (like rice and roti) are the primary enemy – stale carbs are good to have	They are body's main source of energy so depriving the body's natural fuel is bad in long term. The timing, quantity etc. are important
Millets can be eaten in unlimited quantities – not heavy on gut	Millets are in general high in fiber and low in nutrients, hence, excess millets can be harmful
Protein powders cause kidney damage	Indians in general are deficient in protein. However, any underlying health conditions or disease needs specific attention

Evidence-based nutrition supports informed decision-making



BURDEN TO INDUSTRY

Struggling everyday battle resolving issues of the ecosystem – Disruption - Defamation – Misinformation

Developing consumer-focused products through innovation, reformulation, and better ingredients

Raw Material & Regulatory Constraints

Raw material availability challenges
Tariff and trade barriers
Evolving regulatory restrictions

Regulatory Uncertainty

Sudden blanket enforcement actions
Lack of transition periods
Business continuity disruptions

Market Misuse & Complaints

False or motivated complaints
Brand infringement risks
Pressure for product replacement

Counterfeit Products

Consumer deception
Safety and quality concerns
Erosion of brand trust

Collaborative action between industry and regulators is critical to combat counterfeiting, misinformation, and unfair market practices while ensuring continued consumer access to safe and innovative products

PRODUCT STANDARDS & REGULATIONS

Built on science • Global standards • Regulatory oversight

SCIENCE → SAFETY

Globally, food products are regulated through science-based standards at regional and country level

01

GLOBAL / LOCAL STANDARDS

Regional and country-specific regulations are developed with reference to global standards such as the Codex Alimentarius

02

RISK ASSESSMENT

Scientific assessment of ingredient safety, follow a structured approach

03

SCIENTIFIC REVIEW & APPROVAL

Scientific Panel & Committee reviews, followed by food authority approval where applicable; evidence and documentation support needed for product claims such as the ePASS system

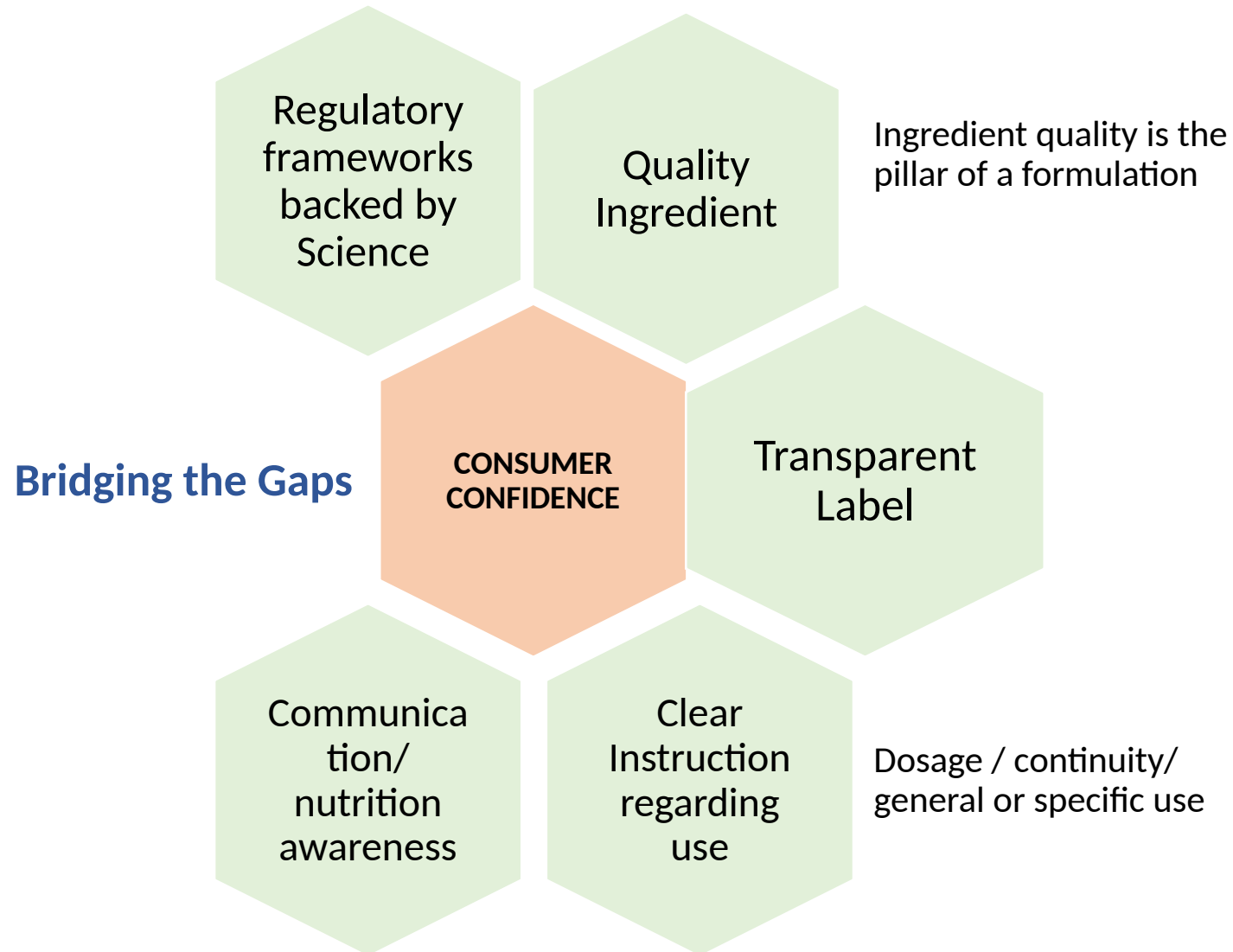
04

POST-APPROVAL CONTROLS

Licensing / product endorsement, GMP / GHP, inspection, audit and Yearly testing help maintain compliance

FSSAI has adopted a standardized, evidence-based framework for reviewing food safety and food standard amendment proposals

CONSUMER CONFIDENCE – MARRYING REG. WITH BUSINESS INTEREST



THANK YOU....

