

# The Complete Technology Book on Flavours, Fragrances and Perfumes (2nd Edition)

**Author:-** NPCS Board of Consultants & Engineers

**Format:** paperback

**Code:** NI196

**Pages:** 456

**Price: Rs.1975US\$ 200**

**Publisher:** NIIR PROJECT CONSULTANCY SERVICES

Usually ships within **5** days

Flavours, as the name suggests, refer to the sensory experiences we encounter through taste. From the zesty burst of lemon in a refreshing drink to the rich, smoky flavors in our favorite barbeque sauce, flavors enhance our culinary adventures. They are created using a combination of natural and synthetic compounds carefully blended to excite our taste buds.

Moving on to fragrances, they encompass the scents we encounter through our sense of smell. Think of the fresh, floral aroma of a bouquet of roses or the comforting, warm notes of vanilla in a scented candle. Fragrances are carefully crafted using a mixture of essential oils, aromatic compounds, and fixatives to create captivating scents that can transport us to another world.

Perfumes indeed elevate the experience of fragrances. They artfully mix various aromatic compounds to form distinctive scents, encapsulated in different forms like eau de toilette and parfum. The power of perfume lies in its ability to stir emotions, boost confidence, and create a memorable impact on people in its vicinity.

The global flavors and fragrances market was valued at USD 29.98 Billion, increasing at a CAGR of 4.90% and anticipated to reach USD 48.37. The flavors and fragrances market explains that the increasing demand for cosmetics products such as soaps, make-up equipment, and perfumes is flourishing the demand for flavors and fragrances. The global perfume market size was valued at USD 45.85 billion and is projected to grow from USD 48.05 billion to USD 69.25 billion, exhibiting a CAGR of 5.36%. Perfumes are generally composed of fragrances and various oils to give out a pleasant aroma. The increasing demand for beauty products across the globe is accelerating the beauty industry. This, in turn, is expected to drive the perfume market growth.

This book offers comprehensive insights into various fragrance-related topics including Beverage Flavorings, Fruit and Vegetable Flavours, Flower Perfumes, Production of Natural Perfumes, Miscellaneous Fancy Perfumes, Perfume Oils, Fantasy Perfumes, Soap Perfumery, Floral and Fruity Fragrances, Woody Fragrance, Aerosol Perfume Spray and Aerosol Perfume. The Formulation, Process, Machinery, Equipment Details, and Photographs with Suppliers Contact Details are also given.

A detailed guide on the manufacturing and entrepreneurship of Flavours, Fragrances and Perfumes sector. This book serves as a one-stop shop for everything you need to know about

the Flavours, Fragrances and Perfumes industry, which is rife with opportunities for start-ups, manufacturers, merchants, and entrepreneurs. This is the only book on the production of commercial Flavours, Fragrances and Perfumes. It's a veritable feast of how-to information, from concept through equipment acquisition.

1. Flavours 1.1. Introduction 1.2. Uses and Applications in Industry 1.2.1. Food and Beverage Industry 1.2.2. Fragrance and Perfume Industry 1.2.3. Pharmaceuticals and Personal Care Products 1.2.4. Cosmetic Industry 1.3. Benefits of Flavours 1.4. Manufacturing Process 1.4.1. Natural Flavours 1.4.2. Synthetic Flavours 1.5. Why to Start a Flavours Business 1.5.1. Growing Demand 1.5.2. Diverse Applications 1.5.3. Innovation and Customization 1.5.4. Sustainability and Health Trends 1.5.5. Global Reach 1.5.6. Value Addition 1.5.7. Regulatory Compliance 1.5.8. Long-Term Viability 1.5.9. Conclusion 2. How to Start Flavours Manufacturing Business 2.1. Market Research 2.2. Business Plan 2.3. Legal Structure and Registration 2.4. Location and Equipment 2.5. Ingredients and Suppliers 2.6. Recipe Development 2.7. Quality Control and Testing 2.8. Packaging and Branding 2.9. Marketing and Promotion 2.10. Distribution and Sales Channels 2.11. Compliance and Regulations 2.12. Financial Management 2.13. Scale and Growth 2.14. Customer Feedback and Improvement 2.15. Sustainability and Ethics 3. Plant Layout Description of Flavours Manufacturing 3.1. Raw Material Storage 3.2. Mixing and Blending Area 3.3. Extraction and Distillation Section 3.4. Quality Control and Testing 3.5. Packaging Area 3.6. Storage and Warehousing 3.7. Shipping and Distribution 3.8. Administrative and Office Areas 3.9. Employee Facilities 3.10. Utilities and Support Systems 3.11. Safety Measures 3.12. Regulatory Compliance 4. Beverage Flavourings 4.1. Introduction 4.2. Categories of Beverages 4.3. Types of Flavourings for Beverages 4.4. Methods of Extraction, Solubilisation and Concentration of Flavourings 4.4.1. Extraction of Coffee Flavour and Manufacture of the Instant Product 4.4.2. Flavourings Extracted from Harvested Fruits 4.4.3. Extraction and Use of Oil Soluble Flavourings 4.5. Beverages Based on Ginger 4.5.1. Manufacture of Ginger Extract 4.5.2. 'Original' (hot) Ginger Ale 4.5.3. 'American' or 'Pale' Ginger Ale 4.6. Formulation of Beverages 4.6.1. General Principles 4.6.2. Principal Components Used in the Formulation of Beverages 4.6.3. Label Claims 4.6.4. Sweetness/ Acid Ratio 4.6.5. Alcoholic Components 4.6.6. Water 4.6.7. Characterising Ingredients 4.6.8. Other Ingredients 4.6.9. Acidulants and Acidity Regulators 5. Fruit and Vegetable Flavours 5.1. Fruit Flavors 5.1.1. Theaspiran 5.1.2. Preparation of trans-E-Crotonoyl-2,2,6-Trimethylcyclohexane 5.1.3. a-Oxy(oxo) Mercaptans 5.1.4. Extracted from Cocoa Shells 5.2. Vegetable Flavors 5.2.1. a-Substituted Alkylidene Methionals 5.3. Fruity Flavor Enhancers 5.3.1. a-Oxy(oxo) Sulfides and Ethers 5.3.2. Maltol-2-Methyl Pentenoates 5.3.3. Organoleptic Properties 5.4. Fruit Bits 5.4.1. Resembling Bits of Natural Fruit Meat 6. Perfumes 6.1. History of Perfumes 6.2. Types of Perfumes 6.3. Industrial and Commercial Applications 6.4. Benefits of Perfumes 6.4.1. Confidence Booster 6.4.2. Mood Enhancement 6.4.3. Memory Trigger 6.4.4. Cultural and Personal Expression 6.4.5. Sensory Pleasure 6.5. Perfume Manufacturing Process 6.6. Ingredients Used for Making Perfume 6.7. Different Perfume Manufacturing Techniques 6.7.1. Distillation Technique 6.7.2. Extraction Technique 6.7.3. Headspace 6.8. Process of Making Perfume 6.8.1. Mixing the Ingredients 6.8.2. Ageing Process 6.8.3. Quality Control 6.9. Why to Start a Perfume Business? 6.9.1. Creative Expression 6.9.2. Entrepreneurial Opportunities 6.9.3. Potential for Profit 6.9.4. Intellectual Property and Branding 6.9.5. Sustainability and Ethical Considerations 6.9.6. Versatile Sales Channels 6.9.7. Global Reach 6.9.8. Artisanal Craftsmanship 6.9.9. Personal Fulfillment 6.9.10. Continuous Learning and Growth 6.9.11. Contribution to Culture 7. How to Start Perfume Manufacturing Business 7.1. Market Research 7.2. Business Plan 7.3. Legal Requirements 7.4. Formulate Perfumes 7.5. Sourcing Ingredients and Packaging 7.6. Manufacturing Facility 7.7. Production Process 7.8. Quality Control 7.9. Branding and Marketing 7.10. Distribution 7.11. Pricing Strategy 7.12. Launch 7.13. Customer Feedback 7.14. Scale and Expand 8. Plant Layout Description of Perfume Manufacturing 8.1. Reception Area 8.2. Raw Material Storage 8.3. Mixing and Blending Area 8.4. Filtration and Clarification 8.5. Aging and Maturation 8.6. Bottling and Packaging Area 8.7. Quality Control

and Testing 8.8. Storage and Warehousing 8.9. Shipping and Distribution 8.10. Utilities and Support Facilities 8.11. Safety and Compliance 9. Flower Perfumes 9.1. Rose 9.2. Jasmin 9.3. Orange Flower And Neroli 9.4. Violet 9.5. Acacia 9.6. Broom 9.7. Carnation 9.8. Cyclamen 9.9. Fougere (Fern) 9.10. Gardenia 9.11. Hawthorn 9.12. Heliotrope 9.13. Honeysuckle 9.14. Hyacinth 9.15. Iris 9.16. Lilac 9.17. Lily-Of-The-Valley 9.18. Linden (Lime Blossom) 9.19. Magnolia 9.20. Mignonette (Reseda) 9.21. Mimosa 9.22. Narcissus 9.23. Nardo 9.24. New-Mown Hay 9.25. Nicotiana 9.26. Opopanax 9.27. Orchid (Orchidee) 9.28. Pansy 9.29. Peony 9.30. Phlox 9.31. Stocks 9.32. Sweet Pea 9.33. Syringa (Philadelphus) 9.34. Trefle (Clover) 9.35. Tuberose 9.36. Verbena 9.37. Wallflower 9.38. Wistaria 9.39. Ylang-Ylang 10. The Production of Natural Perfumes 10.1. The Perfume in the Plant 10.2. Times of new Crops 10.3. The Separation of Natural Odoriferous Materials 10.3.1. Distillation 10.3.2. Expression 10.3.2.1. The Sponge Process 10.3.2.2. The Ecuelle Method 10.3.2.3. Machine Processes 10.3.3. Extraction 10.3.3.1. Enfleurage 10.3.3.2. Maceration 10.3.3.3. Volatile Solvents 10.3.4. Absolutes with Synthetics 10.3.5. Extraction with Liquid CO<sub>2</sub> 10.3.6. Extraction with Butane 10.3.7. Statistics 11. Miscellaneous Fancy Perfumes 11.1. Non-Alcoholic Concentrates 12. Perfume Oil 12.1. Introduction 12.2. Perfume Oil Formula 12.3. Manufacture of Perfume Oils 12.3.1. Metering Techniques 12.3.2. Conventional Metering 12.3.3. Automatic Metering on a Production Scale 12.3.4. Automatic Metering on a Laboratory Scale 12.3.4.1. Metering Similar to Production Scale 12.3.4.2. Robot System 12.3.5. Mixing of Perfume Oils 12.4. Control by Bar Code 12.5. Machinery and Apparatus 12.5.1. Mixing Receptacles 12.5.2. Stirring and Mixing Systems 12.5.3. Pumping Systems 12.5.4. Filling Technique 12.6. Storage of Fragrances and Perfume Oils 12.7. Safety Aspects 12.8. Future Prospects of Compounding 13. Fantasy Perfumes 13.1. Introductory 13.2. Floral Bouquet Perfumes 13.3. Aldehydic Perfumes 13.4. Chypre Types 13.5. Oriental Perfumes 13.6. 'Green' Perfumes 13.7. Dominant Note Types 14. Soap Perfumery 14.1. Soap Manufacture 14.2. Raw Materials 14.3. Shaving Soap 14.4. Transparent Soaps 14.5. Super-fatted Toilet Soaps 14.6. The Milling Process 14.7. Coloured Soaps 14.8. Perfumes 14.9. Soap Compounds 15. Fragrances 15.1. Introduction 15.2. Uses and Applications in Industry 15.3. Benefits of Using Fragrances 15.4. Manufacturing Process 15.5. Why to Start a Fragrance Business 16. How to Start Fragrances Manufacturing Business 16.1. Business Plan 16.2. Business Name and Entity 16.3. Finance 16.4. Market and Sales Strategy 16.5. Packaging Design 16.6. Operations Plan 16.7. Legalities 16.8. Online Presence 17. Plant Layout Description of Fragrances Manufacturing 17.1. Raw Material Storage 17.2. Mixing and Blending Area 17.3. Quality Control and Testing 17.4. Production Lines 17.5. Packaging and Storage 17.6. Employee Facilities 17.7. Safety Measures 17.8. Administrative Offices 17.9. Utility and Maintenance 18. Floral and Fruity Fragrances 18.1. Floral 18.1.1. Octadienes 18.1.2. Hexyloxyacetonitrile 18.1.3. Cyclopentanone Derivatives 18.1.4. 2-Ethyl-6,6-Dimethyl-2-Cyclohexene-1-Carboxylic Acid Ethyl Ester 18.1.5.  $\alpha$ -Oxy(Oxo) Sulfides 18.1.6. Aliphatic Dibasic Acid Diesters 18.1.7. 3-(10-Undecenyloxy) Propionitrile 18.1.8. Tricyclodecane-Methylol and Derivatives 18.1.9. 2-Methyl-2-Alkyl-Alkanoic Acid Esters 18.1.10. Trimethylcyclohexylethyl Ethers 18.1.11. Cyanoethylidene-Bicyclo-Heptenes 18.1.12. Certain Crotonyl-Trimethylcyclohexanes 18.1.13. Ketone Acetals 18.1.14. Certain Allyl Ethers 18.1.15. Nonanols, Nonenols and Their Monocarboxylic Acid Esters 18.2. Fruity Fragrances 18.2.1.  $\alpha$ -Oxy (Oxo) Mercaptans 18.2.2. cis-Oct-6-en-1-al 18.2.3. Safranic Acid Esters 18.2.4. Maltol-2-Methyl Alkenoates 19. Woody Fragrance 19.1. Woody-General 19.1.1. Substituted 1-Alkenynyl-Cyclohexanols 19.1.2. Polycyclic Alcohols 19.1.3. Cyclohexene-3-Nitriles 19.2. Vetiver 19.2.1. Tricyclo Ketones 19.2.2. Substituted Acetonaphthones 19.3. Sandalwood 19.3.1. Catechol-Camphene Reaction Products 19.3.2 Cyclopentene Derivatives 19.3.3 2,3-Dimethyl-5-(Substituted Cyclopenten-1-yl) -2-Pentanol 19.4. Cedarwood 19.4.1. Certain Isolongifolene Compounds 20. Aerosol Perfume Spray 20.1. Introduction 20.2. Technical Support for Aerosol Perfume Spray Filling 20.3. Aerosol Perfume Spray Filling Solutions 20.3.1 Automatic Aerosol Filling Machine for the Production of Aerosol Perfume Spray 21. Aerosol Perfume 21.1. Why do Aerosols Feel Cold? 21.1.1 Propellants 21.1.2 Valve 21.2. Types of Aerosols 21.3. Aerosol Use 21.4. General Use of Aerosols 21.5. How Aerosol are Cans Made?

21.6. How aerosols work 22. How to Start Aerosol Business 22.1. Aerosol Business 22.2. Market Research 22.3. Business Plan 22.4. Legal Requirements 22.5. Product Selection 22.6. Suppliers and Manufacturers 22.7. Branding and Packaging 22.8. Quality Control 22.9. Distribution 22.10. Marketing and Promotion 22.11. Pricing and Profitability 22.12. Safety and Compliance 22.13. Build a Team 22.14. Financial Management 23. Aerosol Plant Layout Description 23.1. Receiving and Storage Area 23.2. Processing Area 23.3. Packaging Area 23.4. Quality Control and Testing Area 23.5. Storage and Warehousing 23.6. Utilities and Support Systems 23.7. Safety Measures 23.8. Office and Administrative Area 23.9. Employee Facilities 23.10. Environmental Considerations 23.11. Security Measures 24. BIS Standards 25. ISO Standards 26. Factory Layout and Process Flow Chart & Diagram 27. Photographs of Plant & Machinery with Supplier's Contact Details Electrical Perfume Making Machine Perfume Mixing Tank Automatic Perfume Filling Machine Automatic Perfume Making Mixer Filling Machine Perfume Extraction Equipment Aerosol Filling Machine Aerosol Filling Machine Aerosol Can Crimping Machine Essential Oil Steam Distillation Unit

## About NIIR

**NIIR PROJECT CONSULTANCY SERVICES (NPCS)** is a reliable name in the industrial world for offering integrated technical consultancy services. NPCS is manned by engineers, planners, specialists, financial experts, economic analysts and design specialists with extensive experience in the related industries.

Our various services are: Detailed Project Report, Business Plan for Manufacturing Plant, Start-up Ideas, Business Ideas for Entrepreneurs, Start up Business Opportunities, entrepreneurship projects, Successful Business Plan, Industry Trends, Market Research, Manufacturing Process, Machinery, Raw Materials, project report, Cost and Revenue, Pre-feasibility study for Profitable Manufacturing Business, Project Identification, Project Feasibility and Market Study, Identification of Profitable Industrial Project Opportunities, Business Opportunities, Investment Opportunities for Most Profitable Business in India, Manufacturing Business Ideas, Preparation of Project Profile, Pre-Investment and Pre-Feasibility Study, Market Research Study, Preparation of Techno-Economic Feasibility Report, Identification and Section of Plant, Process, Equipment, General Guidance, Startup Help, Technical and Commercial Counseling for setting up new industrial project and Most Profitable Small Scale Business.

NPCS also publishes various process technology, technical, reference, self employment and startup books, directory, business and industry database, bankable detailed project report, market research report on various industries, small scale industry and profit making business. Besides being used by manufacturers, industrialists and entrepreneurs, our publications are also used by professionals including project engineers, information services bureau, consultants and project consultancy firms as one of the input in their research.

Our Detailed Project report aims at providing all the critical data required by any entrepreneur vying to venture into Project. While expanding a current business or while venturing into new business, entrepreneurs are often faced with the dilemma of zeroing in on a suitable product/line.

---

**NIIR PROJECT CONSULTANCY SERVICES**, 106-E, Kamla Nagar, New Delhi-110007, India.  
Email: [npcs.india@gmail.com](mailto:npcs.india@gmail.com) Website: [NIIR.org](http://NIIR.org)

Sun, 20 Apr 2025 03:05:51 +0000