

Nanotechnology Industry and Market Review 2017-2018

<https://marketpublishers.com/r/N32DA20426BEN.html>

Date: February 2018

Pages: 270

Price: US\$ 325.00 (Single User License)

ID: N32DA20426BEN

Abstracts

Nanotechnology and nanomaterials are key enablers for a whole new generation of products and processes. New products with enhanced properties are coming onto the market from a broad range of players in consumer electronics, packaging, healthcare and coatings.

Nanotechnology Industry and Market Review 2017-2018 is a comprehensive guide to materials, markets and products in nanotech from January 2017 to January 2018. This publication details leading developments within the industry during this period.

This publication provides a comprehensive review the state of the nanotech sector at present, it's development, and future prospects. Strategic analysis of the key global markets nanotech will impact is the core theme.

Our expert team and industry contributors bring you fascinating, authoritative articles, illustrated with stunning images on nanotech in markets from coatings to consumer electronics.

Contents

1. GRAPHENE IN PRINTABLE, FLEXIBLE AND STRETCHABLE ELECTRONIC DEVICES AND SENSORS THAT WILL REVOLUTIONALIZE CONSUMER ELECTRONICS AND HEALTH

The wearables revolution
Nanomaterials
Graphene
Conductive inks
Medical and healthcare wearables and sensors
Flexible batteries

2. GRAPHENE IN CONSTRUCTION

Cement.
Steel coatings.
Companies.

3. GRAPHENE IN LIGHTING

Organic light emitting diodes (OLEDs).
Graphene LED light bulbs.
Deep ultraviolet light (UV light) LEDs
Companies.

4. GRAPHENE IN AUSTRALIA

Graphene companies in Australia.
Research.

5. GRAPHENE ANTI-CORROSION COATINGS

Market drivers.
Green anti-corrosion coatings.
Nanocoatings.
Graphene.
The oil and gas market.
The marine market.

Companies.

6. GRAPHENE PRICING

Why the distinctions between different grades of graphene are important.

Prospects for new processes to make high quality graphene.

Selling prices for the different recognized variants of graphene. The price per unit mass of different materials referred to as graphene ranges over an amazing 9 orders of magnitude, for a billion dollars per kilogram equivalent of monolayer material (though of course the amount of this material is very small) to a few dollars per kilogram for exfoliated graphite.

Processes for producing large quantities of the highest grade materials, namely monolayer and/or few-layer graphene, at a modest cost.

7. GRAPHENE BATTERIES

Flexibility.

Graphene in lithium-ion batteries (LIB).

Graphene in lithium-air batteries.

Sodium-ion batteries,

Supercapacitors.

Product developers.

8. SELF-HEALING CAPABILITIES COATINGS, POLYMERS AND POLYMER COMPOSITES

What are self-healing materials?

Extrinsic self-healing.

Intrinsic self-healing.

Healing volume.

Self-healing coatings.

Self-healing polymer composites.

Self-healing metals.

Metal matrix composites.

Self-healing ceramics.

Self-healing nanomaterials.

Self-healing biomaterials.

3d printing of self-healing materials.

Self-healing single-walled carbon nanotubes.

Graphene self-healing materials.
Shape memory composites.
Markets for self-healing materials and coatings.
Companies profiles.

9. NANOTECHNOLOGY IN MEDICAL WEARABLES

Medical wearables.
Nanomaterials.
Patch-type skin sensors.
Hydration sensors.
Wearable sweat sensors.
Smart footwear.
Companies.

10. NANOCOMPOSITES

Markets for nanocomposites.
Aerospace.
Automotive.
Packaging.
Nanoclays.
Nanocellulose.
Sporting goods.
Companies.

11. NANOTECHNOLOGY IN SMART TEXTILES

Types of smart textiles.
Smart textile products.
Conductive inks.
Industrial monitoring.
Military.
Energy harvesting textiles.

12. NANOCELLULOSE IN JAPAN

NanoFibrillar Cellulose (NFC).
NanoCrystalline Cellulose (NCC).

Nanocellulose producers in Japan.

13. CONDUCTIVE NANO INKS

Graphene conductive inks.

Printable sensors.

Printed batteries.

Printable antennas.

14. THE MARKET FOR TA-C COATINGS

Main hard ta-C coating material properties.

Comparison with graphene.

ta-C for larger applications.

Recent progress in carbon fundamentals.

ta-C future markets.

15. WATERPROOFING ELECTRONICS

Nanocoatings for waterproofing electronics.

Main hydrophobic, superhydrophobic nanocoatings product developers in waterproofing electronics and coatings techniques.

16. GRAPHENE QUANTUM DOTS

Properties.

Synthesis.

Applications.

Advantages.

Recent commercial activity.

17. THE MARKET FOR SINGLE WALL CARBON NANOTUBES

Applications.

Electronics.

Companies.

18. NANOTECHNOLOGY IN THE SMART TEXTILES AND WEARABLES MARKET

Market growth.

From rigid to flexible and stretchable.

Smart textiles.

Product developers.

**19. NANOTECH INVESTMENTS, DEALS AND FUNDING JANUARY
2017-DECEMBER 2017**

**20. NANOTECH GOVERNMENT, REGULATION & POLICY NEWS JANUARY
2017-DECEMBER 2017**

**21. NANOTECH BUSINESS AND PRODUCT NEWS JANUARY 2017-DECEMBER
2017**

**22. GRAPHENE BUSINESS AND PRODUCT NEWS JANUARY 2017-DECEMBER
2017**

**23. NANOCOATINGS BUSINESS AND PRODUCT NEWS JANUARY
2017-DECEMBER 2017**

**24. OTHER NANOTECH BUSINESS AND PRODUCT NEWS JANUARY
2017-DECEMBER 2017**

I would like to order

Product name: Nanotechnology Industry and Market Review 2017-2018

Product link: <https://marketpublishers.com/r/N32DA20426BEN.html>

Price: US\$ 325.00 (Single User License / Electronic Delivery)

If you want to order Corporate License or Hard Copy, please, contact our Customer Service:

info@marketpublishers.com

Payment

To pay by Credit Card (Visa, MasterCard, American Express, PayPal), please, click button on product page <https://marketpublishers.com/r/N32DA20426BEN.html>

To pay by Wire Transfer, please, fill in your contact details in the form below:

First name:
Last name:
Email:
Company:
Address:
City:
Zip code:
Country:
Tel:
Fax:
Your message:

****All fields are required**

Customer signature _____

Please, note that by ordering from marketpublishers.com you are agreeing to our Terms & Conditions at <https://marketpublishers.com/docs/terms.html>

To place an order via fax simply print this form, fill in the information below and fax the completed form to +44 20 7900 3970