

# Rare earth elements: Mining industry for exotic materials developing

<https://marketpublishers.com/r/R67961BF7CBEN.html>

Date: May 2019

Pages: 20

Price: US\$ 995.00 (Single User License)

ID: R67961BF7CBEN

## Abstracts

Rare earth elements: Mining industry for exotic materials developing

### SUMMARY

Rare earth elements (REE) are now essential to produce a plethora of high-tech goods, from jet engine turbine blades to smartphones and sophisticated batteries contained in electric cars. Demand is soaring, and the need for companies and countries around the world to gain a suitable supply is shining a light on developments in the REE mining industry. China continues to dominate consumption and production of rare earth elements, but signs production is expanding outside of the leading Asian economy are growing in number. Yet this has helped to create a tense geopolitical global environment, meaning the market for rare earth elements is unlikely to behave as traditional markets normally would.

### KEY HIGHLIGHTS

The Chinese mining industry gained in importance considerably due to controlling approximately 90% of rare earth element production. Aware of the obvious geopolitical problems, leading companies across industries situated in the US, Europe and in Asia-Pacific (most notably Japan) have been seeking to reduce reliance on exotic materials rarely found in significant quantities but which are essential to achieving modern high-performance standards.

The 2009 decision from the Chinese government to shrink exports of rare earth elements by 40% serves as an example of the extreme control Beijing holds over what is now a vitally important part of the international mining industry.

Such is the economic significance of rare earth elements that the mining, processing and distribution of REE materials are subject to a never-ending game of high-stakes international politics. China has not always been far ahead of the rest of the world when it comes to mining for materials such as neodymium and cerium, as well as other REE. The United States Congress has many reasons to act.

## **SCOPE**

Examines how industrial use of rare earth elements is changing.

Looks at whether alternative sources to China can be developed.

Assesses the impact of China on the global market.

Examines the influence of geopolitics on the mining of rare earth elements.

## **REASONS TO BUY**

What is happening regarding demand for rare earth elements?

Will Chinese dominance be eroded?

What is the state-of-affairs regarding geopolitics and rare earth elements?

Are finds being found outside of China?

## Contents

### **1. OVERVIEW**

- 1.1. Catalyst
- 1.2. Summary

### **2. INDUSTRY DEMAND FOR RARE EARTH ELEMENTS WILL RISE BUT MINING FIRMS SHOULD BE WARY**

- 2.1. Efficient use of rare earth elements is increasing at speed, changing industry dynamics
- 2.2. Reductions in cobalt use by car makers means greater consumption of certain rare earth elements
- 2.3. Beijing must solve illegal mining problem to gain maximum advantage from REE deposits

### **3. CHINA CONTINUES TO DOMINATE REE MINING, BUT DYNAMICS OF INDUSTRY ARE SLOWLY SHIFTING**

- 3.1. China will retain extreme control over rare earth element mining industry
- 3.2. China has become a net importer, at least for now
  - 3.2.1. Consolidation among Chinese mining firms will help grow long-term legal production

### **4. GEOPOLITICS OF RARE EARTH ELEMENTS MEAN MARKET DOES NOT BEHAVE NORMALLY**

- 4.1. United States is now stressing importance of improving geopolitical position, but doing so is far from easy
- 4.2. US must act fast to halt Chinese progress in REE mining outside of Asia-Pacific

### **5. RARE EARTH ELEMENT DEPOSITS ARE BEING FOUND OUTSIDE OF CHINA**

- 5.1. Alternatives to Chinese supply are emerging but only very slowly
  - 5.1.1. Japan has found very promising reserves of rare earth elements, but big advances are needed to enter market
  - 5.1.2. New finds in Greenland are coming on stream, opening up new supplies for western countries

## **6. APPENDIX**

6.1. Abbreviations and acronyms

6.2. Sources

6.3. Further reading

## **7. ASK THE ANALYST**

## **8. ABOUT MARKETLINE**

## List Of Figures

### LIST OF FIGURES

Figure 1: Number of hybrid and electric cars sold globally, 2011 to 2018 (millions)

Figure 2: Share of cobalt production per country, 2017 (%)

Figure 3: Rare earth element production 2018 (000s tons)

Figure 4: Reserves of rare earth elements (millions of tons)

Figure 5: Metals and mining volume (millions of tons) 2017

Figure 6: Figure Title

Figure 7: Shenghe Resources Holding

Figure 8: Rainbow Gakara project in Burundi

Figure 9: Minamitori Island

## I would like to order

Product name: Rare earth elements: Mining industry for exotic materials developing

Product link: <https://marketpublishers.com/r/R67961BF7CBEN.html>

Price: US\$ 995.00 (Single User License / Electronic Delivery)

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

[info@marketpublishers.com](mailto:info@marketpublishers.com)

## Payment

To pay by Credit Card (Visa, MasterCard, American Express, PayPal), please, click button on product page <https://marketpublishers.com/r/R67961BF7CBEN.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