HISTORY

The first record mentioning oil from the Romanian province of Wallachia is dated 1517. In the beginning, crude oil exploitation simply meant collection from the shallow pits and ditches in the outcrops of the Sub-Carpethian area. The technique involved digging small holes where oil seeped and then was channelled through ditches towards a collecting pit. Deeper “oil mines” were dug by hand from the late 16th century to the 19th century. Some of these “oil mines” were over 30 meters deep.

The industrial start of Romania’s oil industry is considered to be 1857 because of three world firsts that year.

The first country in the world to officially record petroleum production.

Romania was the first country in the world to officially record an oil production of 275 tonnes in the international statistics. Romania was followed by official oil production from the United States in 1859, Italy in 1860, Canada in 1862 and Russia in 1863.

The world’s first refinery

Romania’s first oil processing refinery in the 1840’s was a simple handmade equipment using rudimentary methods similar distilling alcohol in a rustic boiler. Distillation on industrial scale started in 1857 with the building of the Mehedinteanu Brothers refinery. The refinery installations were primitive, with all the equipment and cylindrical vessels were made from wrought iron and heated with wood fire.

Bucharest, the world’s first city illuminated with kerosene

Bucharest was illuminated with 1000 street lamps. On 1st April 1857 everything was ready and working. The oil offered by Mehedinteanu brothers for public illumination had incontestable properties: colourless and with no smell, burning with a light flame with a constant intensity and shape, without smoke, ash or resin.
Romanian scientists and inventors have made lasting contributions to the worldwide oil industry. These include:

**Blowout Protector** By Ing. Virgiliu Tacit and Ing. Valeriu Puscariu

**Refining oil based with sulphur dioxide** by Lazar Edeleanu. separation from the oil of some hydrocarbon groups, without their chemical alteration

Additional important dates:

1861 – 1st well drilled using wooden rods and auger type bits to a depth of 150m

1882 – Establishment of the Geological Bureau

1904 – Establishment of the School for Drilling and Refining Foremen in Campina

1906 - The founding of the Romanian Geologic Institute

1907 - The Romanian-American Company drilled the first well with a rotary bit

1907 - The testing of the first air-system extraction

1908 - First manufacture of oil equipment, installations and the start of repair workshops

1913 - The first natural gas production

1914 - The start of the Petroleum and Mines Section within the Roads and Bridges Construction School

1921 - The testing of the gas-lift extraction system, by ASTRA ROMANA

1927 - First mechanical core and the first gun casing perforation

1931 - The execution of the first electrical well logging

1936 - The first gas injection, on an industrial scale by ASTRA ROMANA, at the Meotian Boldesti oil field, at a 1800 m depth

1951 - The first water injection operation on an industrial scale at Sarmatian Boldesti oil field, at a 2600 m depth

1984 - 7000 Baicoi well reaches a depth of 7025 m
PETROLEUM CLUB OF ROMANIA

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- IOT DOSCO
- INSERV HOLDING
- intthinc
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- LUFKIN INDUSTRIES
- MADAGOS
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- MOL Romania
- Moody International
- Musat & Asociatii
- NNDKP
- NoNo Info-Tech Service
- Parker Lewis
- Pentagon Freight
- Petroconsult
- Petroleum & Gas University
- Petroleum Industry Review
- OMV PETROM
- ONE Supply & Trading
- Optimus
- Petrofac Solutions &
- CONPET
- Creative Business Partners
- DOSCO PetroServices
- DUAL Group
- Dragan & Asociatii
- Ecomed Eastern Europe
- Ecovalor
- Emerson Process Management
- Eneria
- ENVISAN
- Expert Petroleum
- Ferrostaal Christof Romania
- FIWA Group
- FLOWSERVE
- FORAJ SONDE Tirgu Mures
- Future Pipe Industries
- GDF Suez
- GEODynamics
- Gide Loyrette Nouel - Leroy si Asociatii
- HABAU PPS PIPELINE SYSTEMS SRL

- Facilities Support
- PPR
- PricewaterhouseCoopers
- Production Services Network
- Prospectiuni
- RARTEL
- Rafinaria Steaua Romana
- REVICOM OIL
- ROHE Romania
- Romgaz
- Rompetrol Group
- Rompetrol Well Services
- RVR Energy Consult
- Schlumberger
- Sea Point Consultants
- SIEMENS Romania
- Silcotub Tenaris
- Sterling Resources
- Stoica & Asociatii
- Strabaum
- UZUC
- Tacrom Services
- Tebodin Romania Consultants & Engineers
- Tecon Engineering
- Transatlantic Worldwide Petroleum
- TRANSGAZ
- UTI Construction & Facility Management
- Weatherford East Europe Service
- Wilmington Consulting
- Winstar Resources
- WOLF THEISS
- Worley Parsons
- Zeta Petroleum
Refining
Romania possesses substantial oil refining capacities. Romania is particularly interested in the Central Asia-Europe pipelines and seeks to strengthen its relations with some Gulf states. With 10 refineries and an overall refining capacity of approximately 504,000 bbl/d (80,100 m³/d), Romania has the largest refining industry in the region. Romania’s refining capacity far exceeds domestic demand for refined petroleum products, allowing the country to export a wide range of oil products and petrochemicals — such as lubricants, bitumen, and fertilizers — throughout the region.

This is an incomplete list of oil refineries in Romania:

- Arpechim Refinery, (Petrom/OMV), 70,000 bbl/d
- Astra Refinery, (Interagro), 20,000 bbl/d
- Petrobrazi Refinery, (Petrom/OMV) 90,000 bbl/d
- Petromidia Constanţa Refinery, (Rompetrol), 100,000 bbl/d
- Petrotel LUKoil Ploieşti Refinery, (LUKOIL), 68,000 bbl/d
- Petrolsub Suplacu de Barcău Refinery, (OMV), 15,000 bbl/d
- RAFO Oneşti Refinery, (Calder A), 70,000 bbl/d
- Steaua Romană Câmpina Refinery, 15,000 bbl/d
- Vega Ploieşti Refinery, (Rompetrol), 20,000 bbl/d
- Dermanesti Bitumen Refinery (Prospectiuni) 15,000 bb/d

IPIP S.A.
Engineering and Design Institute for Oil Refineries & Petrochemical Plants
Romanian company with a large range of capabilities and experience, which was established in 1950, at Ploiesti. For almost 50 years, not only in Romania but also in the southeast of Europe, IPIP S.A. was the only design institute for refineries and petrochemistry, and acquired a high prestige due to the recognized quality of its specialists and achievements.

The Institute has performed the complete engineering and design for the achievement and implementation of the new Romanian refineries and for the revamping and extension of the existent ones. Thus, IPIP has fully designed the 11 oil refineries of Romania, totaling a processing capacity of about 40,000,000 Mt/y, and a great number of objectives abroad, spread worldwide and comprising, mainly, oil refineries, lube oil / gas processing complexes, oil terminal and other associated facilities.
Research and Development

Romania has a well developed R&D sector. The chart below shows Research and development expenditure, news and forecasts for Research and development expenditure (% of GDP) in Romania. The main industries in Romania are: electric machinery and equipment, textiles and footwear, light machinery and auto assembly, software, mining, timber, construction materials, metallurgy, chemicals, food processing and petroleum refining.

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<tr>
<td>High-technology exports (% of manufactured exports) in Romania</td>
<td>6.7</td>
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<tr>
<td>High-technology exports (US dollar) in Romania</td>
<td>2,744,172,899.0</td>
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<tr>
<td>Patent applications; non-residents in Romania</td>
<td>36.0</td>
</tr>
<tr>
<td>Patent applications; residents in Romania</td>
<td>995.0</td>
</tr>
<tr>
<td>Research and development expenditure (% of GDP) in Romania</td>
<td>0.6</td>
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<tr>
<td>Researchers in R&amp;D (per million people) in Romania</td>
<td>907.9</td>
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<tr>
<td>Technicians in R&amp;D (per million people) in Romania</td>
<td>216.3</td>
</tr>
<tr>
<td>Trademark applications; direct non-resident in Romania</td>
<td>823.0</td>
</tr>
<tr>
<td>Trademark applications; direct resident in Romania</td>
<td>10316.0</td>
</tr>
<tr>
<td>Trademark applications; Madrid in Romania</td>
<td>4439.0</td>
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**Education**

The University of Petroleum and Gas (UPG) is a fully accredited university offering bachelors, masters and doctorates in oil and gas engineering areas such as petroleum engineering, drilling, well logging and reservoir engineering. It is the only college in Romania that prepares specialists in the field of oil and gas exploitation, and among the few in Europe and even the world.

Students and faculty masters at the UPG have access to an elite teaching staff and specialized research laboratories and teaching modern, cutting-edge software, and tools. Skills spectrum obtained by students and faculty master is very large.

The Faculty of Geology and Geophysics at the University of Bucharest has a teaching faculty of 79 professors and instructors, including four member of the Romanian Academy of Sciences. The faculty of Geology and Geophysics has 562 students enrolled in degree programs in Geology, Geophysics, Environmental Geology, Geochemistry, Minerology and Geochemistry.

The Faculty is involved in numerous research projects with World Bank, the Romanian Ministry of Economy, US Geological Survey and a number of other prestigious organizations.

**CODECS** was founded in 1993 to specifically meet the market’s needs of adult managerial training. **CODECS** uses distance education, method taken from one of the – *The Open University* from Great Britain. **CODECS** is a supplier of the MBA program abiding the quality standards required by the Open University. **CODECS** is today a leader in Romania in delivering integrated solutions to academic, professional and consultancy knowledge.

**CODECS** developed new products – *personalized training programs and managerial consultancy*. The training programs are created to adapt to the organizations’ needs, in both content and learning methods and the adaptation of the difficulty level of concepts to the participants’ level of preparation, the learning process being based on a partnership-type relationship.