

CHALLENGES FOR THE DEVELOPMENT OF RM SECTOR SME'S IN GREECE

ADVANCED MINERALS & RECYCLING INDUSTRIAL SOLUTIONS P.C. (ADMIRIS)

SPECIAL CHARACTERISTICS OF MINING INDUSTRY

- Cannot chose the location of the mine and in many cases of the processing plant
 - Long lead times (prospecting, evaluating, licensing (nimby), accessing, development)
 - For metallics: Metal prices fluctuation
 - For industrial minerals: No intrinsic value – Understanding and confirming the VTC takes time and can vary significantly depending on competitive reserves
 - Topline forecast is challenging
 - Capital intensive
 - Significant environmental footprint
 - Growing consolidation makes competing challenging
-

LICENSING 1

- Complex legal framework – appeals to Council of State
 - Many ministries involved, more than 10 different public authorities approval necessary. One-stop-shop is still a dream
 - Public agencies are severely understaffed and there is a loss of expertise and “agency memory”
 - Lack of implemented National Mining Policy in coordination with a complete specialized Land Use planning
 - Competing economic activities are hindering the smooth and fast licensing
 - Other Ministries are NOT aware of the National Mining Policy...
-

LICENSING 2

- Lack of cadaster in many regions of the country
 - Social Licensing is challenging
 - Lack of stakeholders acquaintance to mining industry – NIMBY mentality “overdeveloped” in Greece
 - Negative track record of mining industry in the 50’s and 60’s
 - Mining closely associated to politics – Each Minister (even with same ruling party) has different view on RM Industry
 - As a result: Licensing time varies from 2 to 20 years!
-

PROSPECTING

- Lack of available geological information & primary research
 - Necessary for a speedy start
 - IGME (Institute of Geological and Mineral Exploration) is understaffed and underfinanced
 - Cannot take advantage of its rich info database (or whatever is remaining) and available equipment for offering quality services
 - Several geological and engineering university schools do exist, but their data on prospecting are limited or not readily available to the public
 - Prospectors have to start almost from scratch in most cases
-

PRODUCTION TECHNOLOGY

- Shifting from traditional production methods (due to environmental or even market needs) is always challenging
 - E.g. marble companies want to go underground, a different expertise needs to be developed
 - Optimization of production methods and facilities require
 - Good understanding of innovation in machinery and technology (which takes place abroad)
 - Good network with peers (problem sharing)
 - There is need for CAPEX
-

PRODUCT & APPLICATION DEVELOPMENT 1

- Especially critical in Industrial Minerals business
 - Need for deep understanding of Materials
 - Complex and expensive research labs are required – SMEs cannot afford them
 - Few (but good) specialized labs focusing on materials and relevant application tests not known to several producers
 - Development of new products require “patience money”, usually not available in SMEs
 - Even IP protection (patents) is challenging for Greek SMEs
-

APPLICATION & PRODUCT DEVELOPMENT 2

- Need for deep understanding of Applications in order to maximize product prices (VTC) and value added
 - Main markets are located far from Greece – Finding the Unmet Market Needs is more arduous
 - Application testing is challenging
 - Very expensive promotional campaign
 - E.g. homologation for wollastonite in automotive industry (in plastics compounding as functional filler) can last from 2 to 5 years! Difficult to provoke the interest of the big compounders – their tests are also very expensive – They bet only on well known and reliable mineral producers, since quality fluctuations and supply unreliability cost money
 - Difficult to find applications for rejects (e.g. marble industry) – Imbalance between production and sales volumes – Zero waste mining difficult
-

HUMAN RESOURCES - EDUCATION

- Even with today's high unemployment rate in Greece (23,2%), RM companies are facing difficulties to find the right people – Recruitment period can reach 6 months!
 - Brain drain makes things even more difficult. Valuable experience is lost. Competition abroad takes advantage of it
 - Education and vocational training curricula do not follow industry needs
 - Communication and cooperation between RM Industry and relevant Academia needs reinforcement
 - State needs also to address the “alignment” between companies and universities
 - Finding trained workers (electricians, welders, miners etc.) is also hard
-

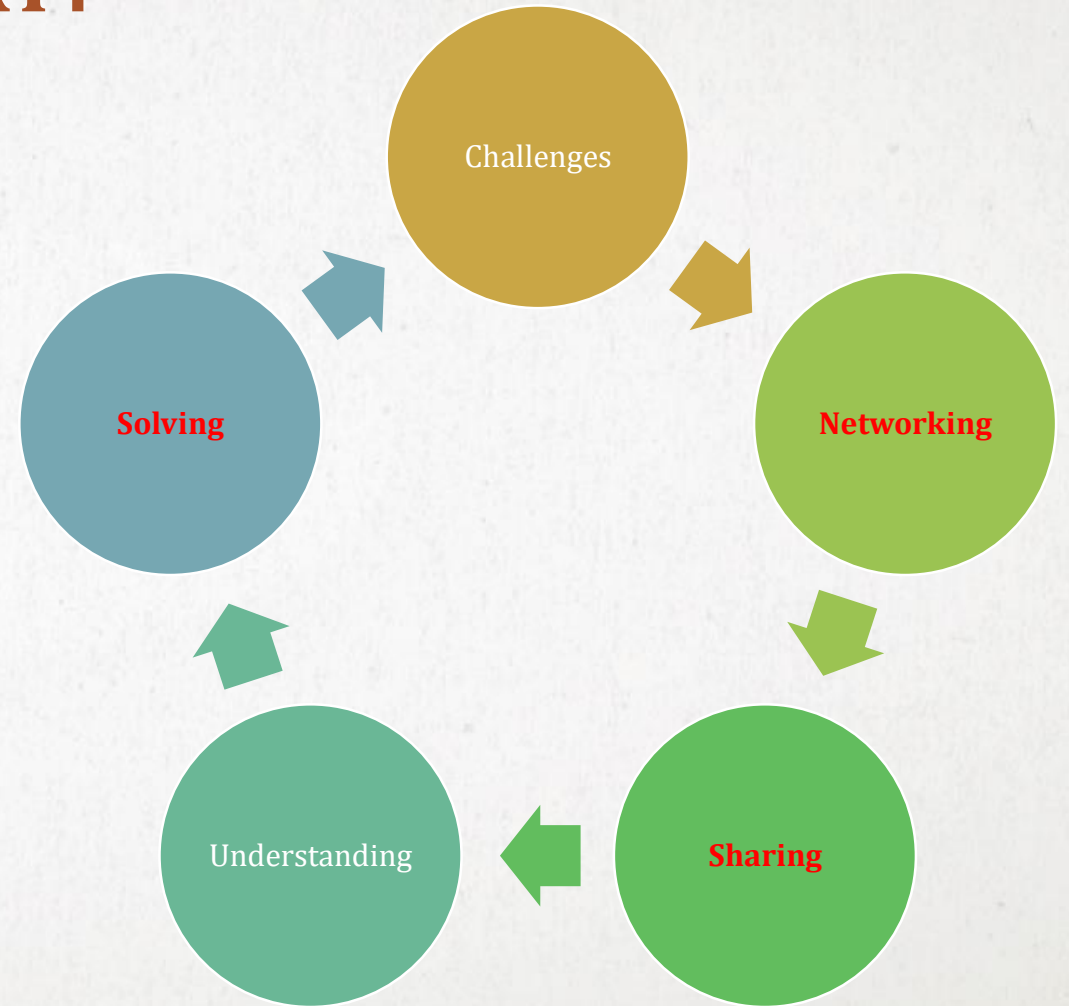
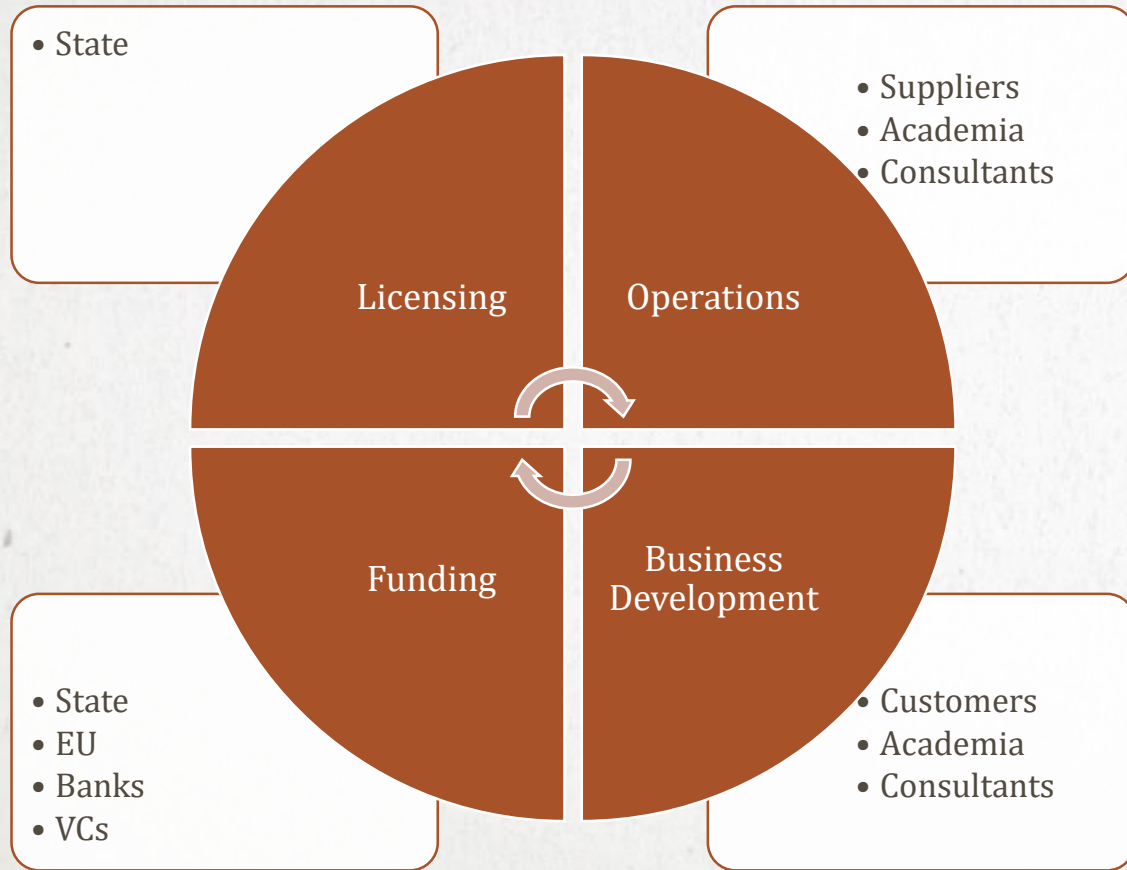
FUNDING & INVESTMENT ENVIRONMENT 1

- RM sector business is a capital intensive effort. Significant funding required, long before sales start
- WACC for Greek companies, and especial for SMEs, is higher than the one of their competitors (>10% vs <7%)
 - Financial crisis in Greece makes capital expensive even for purely exporting companies
 - Licensing is complex
 - Size of the companies is small
 - Cannot participate competitively in the world race of consolidation

FUNDING & INVESTMENT ENVIRONMENT 2

- Licensing and continuously changing taxation discourage VCs
 - No access to Stock Exchanges for funding
 - Lack of tangible incentives – Delays in national funded programs
 - The multitude of European funded programs (LIFE, Horizon2020) are not well known to several companies or they do not have enough personnel to make a competitive application
 - The Greek SMEs could participate successfully in European projects consortia but they lack the connection with European Industry and Academia
-

WHO CAN PROVIDE SUPPORT?



THANK YOU!
