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## **Midrex and Synthesis Energy Systems Expand Global Strategic Alliance for Optimizing MXCOL(R) DRI Facilities**

### **Midrex to Take the Lead on Fully Integrated Cleaner Coal Gasification-Based DRI Solution**

CHARLOTTE, N.C. and HOUSTON, July 21, 2015 (GLOBE NEWSWIRE) -- Midrex Technologies, Inc. (Midrex), a subsidiary of Kobe Steel, Ltd. (ADR-OTC:KBSTY), and Synthesis Energy Systems, Inc. (SES) (Nasdaq:SYMX) announced the signing of a Project Alliance Agreement that expands their exclusive relationship for integration and optimization of direct reduction ironmaking (DRI) technology using coal gasification. Midrex will take the lead in marketing, sales, proposal development, and project execution for coal gasification DRI projects as part of the new project alliance. Midrex may also lead the construction of the fully integrated solution for customers who desire such an execution strategy. SES will provide the SES Gasification Technology for each project including engineering, key equipment, and technical services. The fully integrated state-of-the-art gasification-based DRI facility will have total plant guarantees. The agreement includes finalization of an engineering package for the optimized coal gasification DRI solution.

These state-of-the-art facilities will seamlessly combine the industry-leading MIDREX<sup>®</sup> Process using the MXCOL<sup>®</sup> configuration with the advanced fluidized bed SES Gasification Technology to create clean syngas from abundant, low quality, locally-sourced coals in order to convert iron ore into high-purity DRI.



"Pairing SES Gasification Technology with Midrex's MXCOL<sup>®</sup> DRI technology represents the future of cleaner, high quality ironmaking, especially in regions with limited natural gas resources," said James D. McClaskey, President and CEO of Midrex Technologies, Inc. "Combining these first-in-class technologies opens up tremendous new markets for DRI, giving Midrex increased sales opportunities and a single point source for a complete plant solution for our customers."

SES's proven technology is uniquely capable of cleanly converting even extremely high-ash low-rank coals into valuable syngas for DRI production. This technology along with MXCOL<sup>®</sup> can enable DRI production in areas such as India that have limited access to low-cost natural gas but abundant low-grade coal resources.

"We entered this strategic partnership to align SES Gasification Technology with Midrex's MXCOL<sup>®</sup> due to Midrex's commanding global DRI industry leadership position, brand recognition, technology know-how, and superior project execution track record," said Robert W. Rigdon, President and CEO of Synthesis Energy Systems, Inc. "We are very pleased to take our collaboration to the next level and embark on this fully integrated and optimized product offering. Together, we are creating a gasification-based DRI solution that is capable of cleanly converting virtually any coal, including low-rank lignite, coal wastes, and coal with high ash and/or high moisture content, into syngas for DRI steelmaking that will enable Growth with Blue Skies."

Midrex and SES rolled out their marketing alliance in May 2014 following the successful early engineering co-development effort of the joint technologies. That effort provided results leading the partners to believe that the combined cleaner, efficient and economic product will have widespread application, especially in gas-short regions with low quality, low cost coal, which comprise more than 50% of the world's coal resources.

"Meeting the world's evolving environmental needs to make top-grade DRI products by best utilizing local coal sources and raw materials is an optimum solution unique to our combined, commercially robust technologies," said Mr. McClaskey. "There is no other combined product offering like this available in the steel industry. We forecast strong growth for our partnership with SES and the industry as a whole. The broadening of new and low cost DRI production in developing regions with natural gas limitations is a key driver that will enable this growth where demand is highest."

**About Midrex Technologies, Inc.**

Midrex Technologies, Inc., a wholly owned subsidiary of Kobe Steel, is an international process technology company providing steelmakers with commercially proven solutions for greater profitability and has been the leading innovator and technology supplier for the direct reduction of iron ore for more than 40 years. The company offers eco-friendly technologies for ironmaking that provide high productivity, outstanding product quality, and cost competitiveness. Midrex has built its foundation upon the MIDREX® Direct Reduction Process that converts iron ore into high-purity direct reduced iron (DRI) for use in steelmaking, ironmaking, and foundry applications. Each year, MIDREX® Plants produce about 60 percent of the world's DRI. For more information, visit: [www.midrex.com](http://www.midrex.com).

### **About Synthesis Energy Systems, Inc.**

Synthesis Energy Systems (SES) is a Houston-based technology company focused on bringing clean high-value energy to developing countries from low-cost and low-grade coal and biomass through its proprietary gasification technology based upon U-Gas®, licensed from the Gas Technology Institute. The SES Gasification Technology enables Growth With Blue Skies, and greater fuel flexibility for both large-scale and efficient small- to medium-scale operations close to fuel sources. Fuel sources include low-rank, low-cost high ash, high moisture coals, which are significantly cheaper than higher grade coals, many coal waste products, and biomass feedstocks. For more information, please visit: [www.synthesisenergy.com](http://www.synthesisenergy.com).

### **SES Forward-Looking Statements**

This press release includes "forward-looking statements" within the meaning of Section 27A of the Securities Act of 1933, as amended, and Section 21E of the Securities Exchange Act of 1934, as amended. All statements other than statements of historical fact are forward-looking statements. Forward-looking statements are subject to certain risks, trends and uncertainties that could cause actual results to differ materially from those projected. Among those risks, trends and uncertainties are the ability of our ZZ joint venture to effectively operate XE's methanol plant and produce methanol; our ability to successfully expand the ZZ joint venture through our partnership with Saikong; the ability of our project with Yima to produce earnings and pay dividends; our ability to develop and expand business of the Tianwo-SES joint venture in the joint venture territory; our ability to successfully partner our technology business; our ability to develop our power business unit and marketing arrangement with GE and our other business verticals, including DRI steel, through our marketing arrangement with Midrex Technologies, and renewables; our ability to successfully develop the SES licensing business; events or circumstances which result in an impairment of assets, including, but not limited to, at our ZZ Joint Venture; our ability to reduce operating costs; our ability to make distributions and repatriate earnings from our Chinese operations; our limited history, and viability of our technology; commodity prices, including in particular methanol, and the availability and terms of financing; our ability to obtain the necessary approvals and permits for future projects; our ability to raise additional capital, if any, and our ability to estimate the sufficiency of existing capital resources; the sufficiency of internal controls and procedures; and our results of operations in countries outside of the U.S., where we are continuing to pursue and develop projects. Although SES believes that in making such forward-looking statements our expectations are based upon reasonable assumptions, such statements may be influenced by factors that could cause actual outcomes and results to be materially different from those projected by us. SES cannot assure you that the assumptions upon which these statements are based will prove to have been correct.

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