The Discussion on Gas Supply Security at IEA

Ken Koyama, PhD
Chief Economist, Managing Director
The Institute of Energy Economics, Japan

On April 14, the International Energy Agency hosted a workshop on gas supply security at its headquarters in Paris. At the meeting, more than 30 experts had frank discussions under Chatham House rules on the present situation and challenges regarding gas and liquefied natural gas (LNG) supply security in the world and what roles the IEA should play to address the gas supply security. The purpose of the meeting was to respond to an agreement at the IEA ministerial meeting in November 2015 to adopt tackling gas supply security as a new mandate for the IEA. The agency has sought to accumulate useful knowledge through discussions with experts in the world and urged those experts to compile recommendations to the IEA. At the full-day meeting, active discussions covered various topics including the importance of market transparency and liquidity to enhance gas supply security, the need for investment for gas security enhancement and the significance of enhanced emergency response capacity. In the following, I would like to summarize the points that were particularly impressive to me at the meeting.

First, it was interesting that gas supply security was discussed under the current gas/LNG market conditions, namely, a loose supply-demand balance and low prices. Supply security often attracts attentions when the supply-demand balance is tightening with prices soaring. At present, however, gas prices are weak, including around $2 per million British thermal unit for the U.S. Henry hub and around $4/MMBtu for Asian spot LNG trading. The market has abundant or too abundant supply in the absence of any supply crisis.

Therefore, a focus of discussions was the significance of well-functioning market for supply security and whether the gas market is well-functioning, rather than how to respond to any possible crisis. While the oil market has global characteristics, the gas market even amid globalization still has regional characteristics. Potential risk factors regarding gas supply security differ from region to region or from country to country. Timely and accurate information is important for market functions to fully work. Although no market is close to perfect, information for the gas market is less available than for the oil market. In this respect, participants in the workshop noted that the quality of the gas market information has room to be improved. Therefore, the IEA has potential to play a major role in improving the gas market information.

Second, workshop participants questioned if the present weak gas prices may be creating future gas supply security problems and how gas market stakeholders should respond to such problems. Gas/LNG prices are now low, benefiting consumers. However, the low prices have led
investment required for future supply to be postponed, reduced or cancelled, as is well known. LNG market analyses indicate that after gas oversupply continues until around 2020, supply expansion may fail to catch up with demand growth due to present difficulties in making investment decisions for new LNG projects, leading to a possible change in the gas/LNG supply-demand environment. In considering gas/LNG supply security, we must not only analyze present market information but also expand and improve future outlooks.

When giving consideration to future uncertainties in responding to supply security problems, the issue would be how we should treat uncertain demand. Gas supply chain capacity will have to be secured appropriately to meet future gas/LNG demand. However, it is not easy today. Both developed and emerging countries have uncertainties about their economic growth, while coal, nuclear energy and renewable energy competing with gas have future uncertainties and potential. In this regard, the workshop participants argued that how far the world would enhance climate change measures in line with the Paris Agreement at the 21st Conference of Parties to the United Nations Framework Convention on Climate Change and what roles gas would play in that process would be very important for considering future gas/LNG problems. This argument was very interesting. The IEA may be required to make objective, scientific and neutral analysis on gas/LNG and other energy markets, in response to these uncertainties.

Third, gas supply security problems essentially include how energy policy makers should respond to an emergency, although the problem may not be present now. Since industrial countries created the IEA in the face of the first oil crisis in 1973, its mandate has been to address oil supply security problems including supply interruptions. In this sense, the IEA has accumulated know-how and experiences regarding oil supply security problems. Oil and gas/LNG markets, though having some common points, have various differences including a globalization gap as mentioned above. Therefore, the seriousness of gas/LNG supply security problems and the most important or serious potential risks differ from country to country or from region to region. In order to take advantage of its oil market experiences for the gas/LNG market, the IEA may have to accurately check gas/LNG market problems facing each country or region and analyze necessary policies. It may have to develop various risk scenarios and conduct exercises for responding to emergency situations under these scenarios by exploiting oil market experiences. This may be the role that the IEA could play in tackling gas/LNG problems.

As gas/LNG is expected to enhance its role as a key energy source in the world’s energy market, gas/LNG supply security will become a key challenge. While each country may have to consider its gas/LNG policy with consideration given to costs and benefits of supply security policies, the IEA is expected to play important roles in various areas including market analysis, policy recommendation and emergency responses.