

Lost ITER bid elicits mixed reactions

Where some see setback for Japanese research, others see turning point

By AKEMI NAKAMURA

Staff writer

With Tuesday's decision for France to host the multibillion-dollar experimental ITER nuclear fusion reactor, many experts predict Europe will take the lead in developing the promising energy source.

Some said Japan, which withdrew its bid to host the 1.3 trillion yen International Thermonuclear Experimental Reactor project, must now reinforce its fusion research if it is to remain one of the top countries in the field.

But other scientists and citizens' groups are urging the government to use this opportunity to change its policy on chasing fusion.

Soon after the six parties involved in the ITER project -- China, Japan, Russia, South Korea, the United States and the European Union -- signed a joint declaration in Moscow on Tuesday, Japan emphasized that it would continue developing nuclear fusion technology in an effort to bring the sunlike energy source to fruition.

"This is possible since Japan can host other 'broad approach' projects (related to ITER) under the agreement," explained Toichi Sakata, director general of the Education, Culture, Sports, Science and Technology Ministry's Research and Development Bureau.

Some researchers, however, do not share this rosy view. They say losing the bid to host ITER could negatively impact research and development on fusion in Japan.

"I was disappointed with the result," said Satoru Tanaka, a professor at the University of Tokyo who specializes in nuclear fusion and nuclear fuel-cycle technology. "There will be a major difference between building the ITER plant here and not doing so, in terms of accumulating the necessary technology to build future nuclear fusion reactors and motivating young researchers."

The ITER reactor is considered necessary in the development of fusion technology, which if mastered could help meet the world's electricity needs as demand for power continues to rise.

Although Japan, which had the support of South Korea and the U.S., wanted to host the project in Rokkasho, Aomori Prefecture, the EU, backed by China and Russia, won the bid and will build the main facility in Caradache, southern France.

Since it will take 10 years to build the experimental reactor and another 20 to conduct the experiments, fusion isn't expected to be a reality until midcentury.

Under Tuesday's joint declaration, Japan can host some related projects -- including a simulation center for fusion science and a center for remote experiments -- and fill 20 percent of all posts for the ITER project.

Tanaka said Japan needs to create a new mechanism that will enable government, academic and industrial researchers to cooperate on developing nuclear fusion technologies here so Japan does not fall behind the EU.

But opponents of the ITER bid said that losing it should have triggered a change in priorities.

Atsushi Tsuchida, a physicist at Meijo University in Nagoya, said spending billions of yen on the ITER would have been a waste.

Because massive funding is required to produce tritium, a radioactive isotope of hydrogen needed to trigger nuclear fusion, it is highly doubtful whether fusion technology for generating electricity can be commercialized, he said.

Tadahiro Katsuta of the Tokyo-based nonprofit organization Citizens' Nuclear Information Center and an expert on

nuclear fusion, pointed out that the ITER reactor would be dangerous to operate because it produces radioactive gas, which could escape in the event of an accident.

In Aomori Prefecture, losing the bid apparently disappointed those who were hoping to reap economic benefits of more than 1 trillion yen for the next few decades.

But some local residents hailed the result.

Ryoichi Hirano, corepresentative of a civic group in Aomori demanding the government stop transferring nuclear waste to the village of Rokkasho, said the prefecture should start seeking other ways to develop the local economy than building nuclear-related facilities.

Rokkasho is a major graveyard for nuclear waste and home to nuclear fuel-cycle facilities.

"Political and business leaders here have tried to revitalize the local economy by building nuclear-related facilities," he said. "But it's time to wake up to the fact that sustainable development of the region will not be brought about by this habitual reliance (on large public projects)."

The Japan Times: June 30, 2005

(C) All rights reserved

[Go back to The Japan Times Online](#)

[Close window](#)