

JAPAN

Superagency Seeks to Reconcile Two Cultures

TOKYO—Shigeharu Kato says he can recognize the different personalities of the people who fund Japanese science by the level of noise in the hallways. At the hands-on, applied Science and Technology Agency (STA), where he works, “people are always running through the halls.” But at the ivory-towered Ministry of Education, Science, Sports, and Culture (Monbusho), where he was temporarily assigned to prepare for the pending merger of the two scientific heavyweights, “I never saw anyone running through the corridors.”

The merger, which becomes official on 6 January, creates one superministry that will oversee 75% of public money spent on research and a similar proportion of the scientific workforce funded by the government. It’s part of a long-planned consolidation of 22 cabinet-level agencies into 12, aimed at improving efficiency and reducing the overlapping responsibilities that have sparked bitter turf battles across many sectors. STA, with its 560 employees and \$650 million budget, is being folded into the larger Monbusho, which has a staff of 1600 and spends \$53 billion annually. Its new name reflects its basket of responsibilities: the Ministry of Education, Science, Technology, Sports, and Culture, or Monbukagakusho in Japanese.

The two agencies currently play different roles in the nation’s research efforts. STA enjoys launching strategic, big-science projects, such as commercial rocket development and nuclear power research. More recently it has ramped up research efforts in emerging fields, such as neuroscience and genomics, that offer a potentially large economic payoff. Its staffers pride themselves on their technical expertise, and a senior U.S. scientist who has been involved with numerous bilateral collaborative research efforts says that STA officials generally master the de-

tails more quickly than do their counterparts at Monbusho.

In contrast, Monbusho is responsible for activities ranging from kindergarten to graduate schools, and from sports to the arts. For science, it divvies up small grants to tens of thousands of university researchers and larger awards to institutes working in fundamental fields such as high-energy physics and astronomy. Its employees typically have backgrounds in the humanities.

Scientists are eager to learn how the new agency will reconcile these two divergent approaches to funding basic science. “The cultural differences between the two agencies are immense,” says Hiroo Imura, an endocrinologist and former president of Kyoto University who is now a key government science adviser. Kato says STA officials feel a sense of urgency in bankrolling projects at the cutting edge of a globally competitive enterprise, while Monbusho tries to maintain an established, fairly successful program of academic research. Takahito Ohki, director of the Office of Administrative Reform at Monbusho, says his ministry may deserve its conservative image, but he feels caution has been warranted. “We had to take a longer,

broader view of things and not just follow the latest scientific trends,” he says.

Those differences in culture are reflected in the work layout at each agency, agrees Sanae Aoki, a Monbusho staffer assigned temporarily to STA. “In Monbusho, each division has its own room, while several of STA’s divisions

are all in the same room with no partitions,” says Aoki. She believes STA’s open office plan enhances communication between divisions, which in turn helps them unite behind STA’s major science initiatives. Monbusho’s divisions, on the other hand, have orthogonal responsibilities that require them to operate more independently.

Scientists would like to see STA’s innovative new funding schemes for emerging fields united with Monbusho’s unwavering across-the-board support for basic research. They appreciate the technical expertise that

STA’s scientists and engineers can bring to large-scale projects and international collaborations, but they also like the hands-off approach taken by Monbusho’s humanities graduates toward scientific research. “My worry is that STA staff will have a stronger voice [in the new ministry’s scientific affairs],” says Hiroshi Yoshikawa, a former president of the University of Tokyo who is now president of the Science Council of Japan, the nation’s largest association of researchers. “That might tip the balance from basic research to more applied science.”

Some researchers also worry that the merger is being driven more by politics than policy considerations. “This reorganization was just about slimming the bureaucracy; there was no vision as to what it might mean for science,” says Kiyoshi Kurokawa, dean of the medical school at the private Tokai University. Officials admit that greater efficiency was the impetus for the government-wide merger. But they believe that a consolidated workforce will also raise the visibility of science and strengthen the nation’s research enterprise. “The 21st century is said to be the century of knowledge,” says Kato. “So the ministry where education, science, technology, and culture are being integrated should be the leading ministry for the 21st century.”

One important change already under way, says Motoyasu Abe, director of STA’s Office of Administrative Reform, is the removal of the barriers between researchers affiliated with both agencies. Previously, university researchers had to set up off-campus laboratories for work funded by STA grants. “The walls between university-related and non-university-related institutions and researchers will be removed,” says Abe. “This should make it easier for us to do our job of promoting research.”

Imura believes that, just as with any union, it may be several years before it’s clear whether the offspring is a beauty or a beast. In the meantime, he offers the old saw about how a child produced by George Bernard Shaw and a young starlet might be either brilliant and beautiful, or dumb and ugly. “If the best of the two agencies emerges, it would be really great,” he says. “If it is the worst of the two, it would be a disaster.”

—DENNIS NORMILE



Walk, don't run. Small, quiet offices suit Monbusho's mission, says Sanae Aoki.

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