

Omni



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DREAMS

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FREDERIK POHL
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TO SPACE

WORKING
OUT IN
YOUR SLEEP

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•The Young Pioneers,
the Soviet version of the Boy Scouts,
will search the skies
for messages from extraterrestrials. •

ANTI MATTER

We're always hearing about Russian cosmonauts, the *Mir* space station, and Soviet missions to Mars. But what about the search for extraterrestrial intelligence, or SETI? Are the Soviets actively searching for radio signals from outer space?

Yes. Since 1965 Soviet SETI has been an area of legitimate scientific inquiry. And recently a number of new programs have gotten off the ground.

According to Dr. Nikolai Kardashev of the Space Research Institute at Moscow State University, the Soviets "seldom have special money for SETI." They try in-

stead to kill two scientific birds with one telescope. "Our everyday astronomy projects are very strongly optimized for SETI," Kardashev says, "so if an anomalous electromagnetic signal turns up, it can be analyzed."

An example of this is Kardashev's own research, which centers on a 70-meter radio telescope to be installed near Samarkand in the mountains of Uzbekistan. The radio telescope is being built to study astronomical bodies, says Kardashev, "but we expect to detect some unusual SETI signals from deep space." To that end, Kardashev adds, the new telescope will electronically hold hands with other radio telescopes in the USSR and throughout the world.

The Young Pioneers, the Soviet version of the Boy Scouts, will also search the skies for extraterrestrial signals. Under a program the Soviets call "amateur SETI," the Young Pioneers will use a three-meter infrared radio telescope at the astronomical observatory located at Camp Orlyonok on the Black Sea coast. While the telescope goes about its more



mundane astronomical duties, it will also monitor the equatorial region of the sky for signals from E.T.

Finally, the Soviets are about to see their first dedicated SETI project under the direction of V. S. Troitsky of the Radiophysics Research Institute in Gorky. Troitsky's Project OBZOR will have an array of 20 coordinated small-dish radio telescopes by next year, with as many as 100 by 1995. Although it won't be as sensitive as many American search instruments, it will be more advanced than earlier Soviet technology and provide complete sky coverage.

UFO UPDATE

The scale of this latest project should help the Soviets achieve their SETI goals. According to Thomas R. McDonough, SETI adviser with the Planetary Society, the Soviets are particularly interested in discovering "super-duper civilizations" and have hunted for Dyson spheres—solar systems totally enclosed by their inhabitants—as well as other dramatic space engineering structures. (Westerners, on the other hand, prefer to search for signals from civilizations only moderately more advanced than our own.)

After 24 years of SETI, the major hurdle facing Soviet research is funding. Jill Tarter, principal SETI investigator at the NASA Ames Research Center at Moffett Field, California, says Soviet SETI must receive more government funding before it is equivalent to SETI research in the West. Nonetheless, with scientific interest growing steadily, Soviet SETI investigators have managed to refine their technology and have gotten a few impressive programs off the ground.

—PAUL MCCARTHY